The OIL WEEKLY

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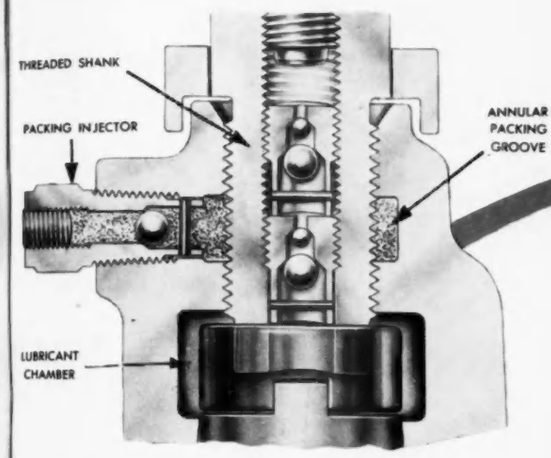

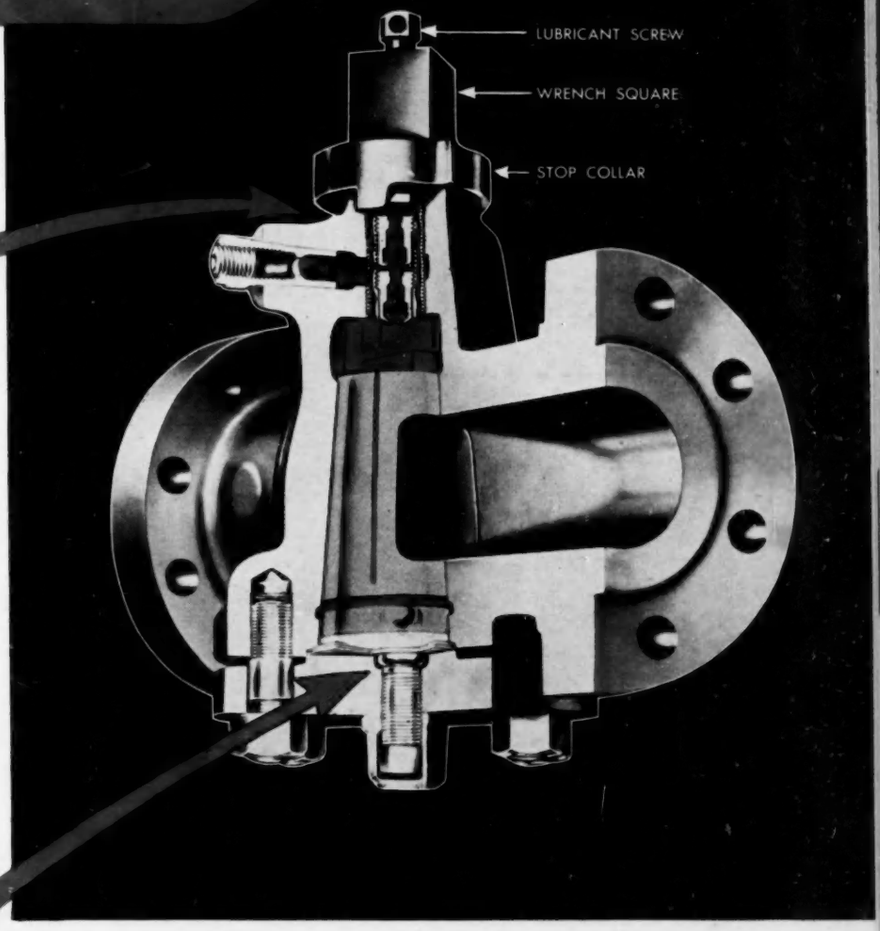

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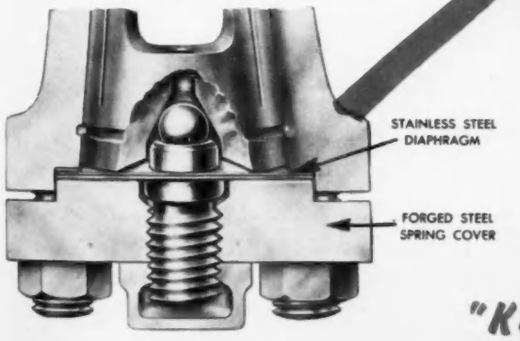

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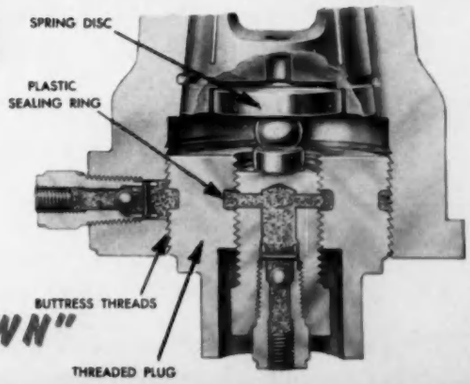

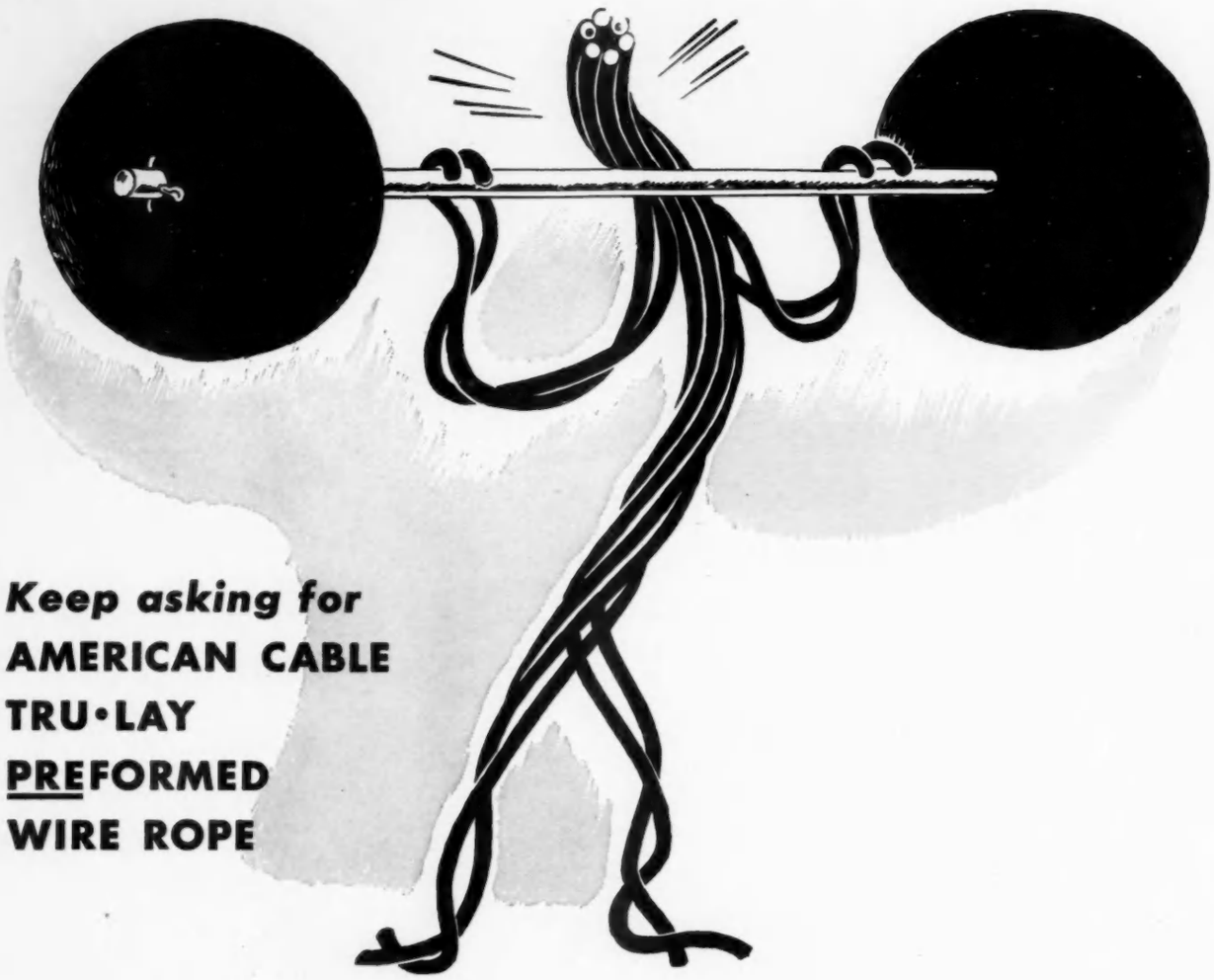

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The OIL WEEKLY and The COMPOSITE CATALOG for the drilling-producing-pipeline industry

PETROLEUM REFINER and The REFINERY CATALOG for the refining-natural gasoline industry

LOOKING AHEAD

...with the Editor

THREE quarters of the year 1943 have passed. These have been an eventful nine months for the petroleum industry. Crude production, especially in recent months, has risen by leaps and bounds to steadily higher all-time peaks. Meanwhile, stocks of crude oil and products have continued to decline, as increasing military demand has exceeded enlarged producing rates.

A statistical study of the petroleum industry's economic position, which will be published next week, will point out these trends and other important factors that indicate the industry will face an acute production problem in 1944.

THE OIL MAN'S CALENDAR

OCT. 5–6	American Association of Drilling Contractors, Rice Hotel, Houston.
13–14	Mid-Continent Oil and Gas Association, Blackstone Hotel, Fort Worth.
25–27	Independent Petroleum Association, Blackstone Hotel, Fort Worth.
26–28	American Gas Association, Jefferson Hotel, St. Louis.
NOV. 8–11	American Petroleum Institute, Palmer House, Chicago.

THE OIL WEEKLY

ENGINEERING • NEWS • STATISTICS

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The Changing Panorama

PAW Anticipates Increased Drilling

ACCELERATED drilling must be achieved during the coming year, whatever the problems to be overcome, if the industry is to be able to fulfill the expanded requirements for petroleum upon which successful prosecution of the war depends. Although production has risen sharply in recent months to new all-time peak levels, output is still behind materially enlarged military consumption. With further gains in military usage of petroleum products certain next year, the question of whether the industry can produce enough oil to fulfill needs is becoming more critical daily. The only way to assure an adequate supply is to make larger quantities of oil available, which can be done only by drilling more wells, now that most regions are producing at their maximum efficient capacity.

PAW sees the need for drilling more wells. In a recent letter sent to equipment manufacturers and service companies of the industry, PAW said: "It is believed that 22,300 wells must be drilled for oil and gas during 1944. Such a program will mean a 25 percent increase over the current rate of drilling."

More Drilling Calls For Men and Rigs

WHILE the oil industry is impressing on government officials and the public the need of an increased price of crude oil to stimulate the wildcatting and development drilling necessary to furnish the country an adequate supply of crude oil, it should be most careful to say that, in addition to an increased price, there are other important factors involved in the job of increasing production.

Price alone will not turn the trick, although price is very important. The manpower situation in the drilling-production industry is bad. The manpower situation in geophysical work is bad. The manpower situation must be improved if the desired increase in wells drilled is attained. To say otherwise, or to say that any other factor alone will get the increased production is foolhardy.

In another article reference is made to a prospective increase of 25 percent in drilling next year, as compared with 1943. In still another article reference is made to the increase in number of rotary rigs in operation now as compared with January of this year.

There seems to be considerable doubt in the minds of those who have been studying the drilling-rig situation as to whether or not there will be enough rigs available to drill 25 percent more wells next year. How many rigs are stacked is an important question, but equally important is the question as to what shape those rigs are in.

Most companies and individuals who have stacked rigs report that these rigs have been robbed of essential parts to keep active rigs running.

It is estimated that at the close of September there were 1187 rotary rigs actually drilling (This from a private source). To increase this 25 percent will take something which the industry does not have at this moment—more men and more rigs. We hope that both will become available, but when we are talking about what will be required to get the increase in production we know will be needed, let's talk about manpower and equipment, as well as price.

PAW Sees Need for More Materials

ANY increase in the rate of drilling must necessarily call for more tools and equipment, and this, along with manpower, may make it difficult for the industry to boost its drilling activity.

Besides seeing the need for drilling more wells, PAW also recognizes that adequate materials is a serious problem. It has promised to help supply companies meet the heavy burden that may be imposed upon them.

The same letter that told manufacturers a 25 percent increase in drilling was seen as necessary next year (see column 1 this page), also sought the cooperation of manufacturing and service companies in meeting the situation. This letter asked these suppliers to report to PAW any circumstances that might impair their ability to dispatch the responsibility of supplying equipment for an enlarged drilling program. The letter indicated a determination to see that no bottleneck occurs. Part of the letter PAW sent manufacturers follows:

"Adequate supplies of tools and equipment, and particularly repair parts for existing equipment, are a prime requisite for the accomplishment of this expanded program. Your company assumes an important responsibility to the nation, and to the petroleum industry, in the part it must play in supplying the increasing demands for oil. It is most important that you, as a manufacturer of oil-field equipment, fabricate and make available your products in quantities that will be required for the projected program. If circumstances arise which threaten to impair your ability to dispatch this responsibility, you are urged to inform the Petroleum Administration for War of the circumstance. This office will assist in any way possible and will perform any service within its power to enable you to assume your just role in this expanding and all-important program."

Drilling Rate Has Accelerated Already

PAW is "making an adequate supply of alloy steel, carbon steel, copper and aluminum available for equipment manufacturers," Frank Watts, Materials Director of PAW writes THE OIL WEEKLY, "but a number of factors have interferred with production of items currently used in the petroleum industry at a rate equal to the industry's needs for these items. Manpower is one factor, conflicting war contracts another, and manufacturing facilities and equipment another.

"The rate of drilling wildcat and development wells has accelerated at a pace greater than the manufacturers and suppliers had anticipated. As a round figure, there are two more rotary wells running each day than were running the previous day. There are now 420 more rotary rigs running than were operating in January of this year. There is evidence that manufacturers and suppliers are realizing their responsibility and doing their utmost to supply materials at an increased rate equal to that of the drilling campaign. As you realize, an accelerated wildcat and development-well drilling program is required to supply petroleum for our mechanized war program."

Watts thinks that petroleum operators should plan their operations as far in advance as is possible, something desirable in ordinary times, but imperative under present conditions, and adds that they should keep their suppliers informed as to their increased needs in order that manufacturers and suppliers may program the manufacture and delivery of materials.

Compact States To Fight Federal Control

THE next meeting of the Interstate Oil Compact Commission, scheduled for December 10 and 11 at Wichita, Kansas, may be one of the most significant ever held because the organization appeared to have been rejuvenated at the Santa Fe meeting, September 24 and 25. Many observers believe that it will grow in importance.

Three governors attended the meeting at Santa Fe; Dempsey of New Mexico, Schoeppel of Kansas, and Kerr of Oklahoma. They were firm in their demand for limitation of the encroachment of federal authority in the states (THE OIL WEEKLY, September 27). Representatives of other governors attending the meeting, declared that their superiors were equally determined that bureaucrat control from Washington must be restricted radically.

"Not only must the encroachment of federal bureaus cease," declared Dempsey, "we must begin at once to recover some of the authority the states have lost. The bureaus in Washington are causing the confusion. Congress must solve this problem.

"Many bureaucrats think regulation means government participation and control of industry. The concentration of authority in Washington is increasing and some of it is unnecessary.

"These agencies have become prosecuting attorney, judge and jury, and there is no appeal from their kangaroo courts.

"The attitude of the public will determine government control after the war. We must not lose democracy at home in winning the peace," Dempsey said.

He condemned the statutes passed by Congress creating agencies which include the provision that violation of the regulations issued by the agency created are punishable by fines up to $10,000 and one year in the penitentiary. He pointed out that these bureaus frequently make requirements that Congress did not contemplate when the act was passed originally.

Dempsey's stand was enthusiastically endorsed by the other governors and by the representatives of industry attending the meeting.

At the Santa Fe meeting it was evident that state officials and representatives of private industry were completely united in their efforts to prevent further encroachment of Washington bureaus and further control of free enterprise. There are 13 states which are members of the Oil Compact Commission and if these can present a united front in Congress, they can wield a vast influence through the 26 senators representing them.

Under the leadership of Chairman Schoeppel, it appeared that the compact was headed in the right direction. Less emphasis would be given to the compilation of statistics already being furnished by three or four competent sources, and more emphasis would be laid on the development of conservation programs and efforts to protect the oil-producing states from the federal government.

Need for Scrap Steel Becoming Acute

THE oil industry, in common with all steel users, is being asked to get behind the "Nation's Stock Pile" drive for enough steel scrap to insure operation of steel plants at full capacity throughout the winter. The campaign is scheduled for six weeks, opening with October and continuing to the middle of November. Scrap iron and steel collected will be brought to central points, as in the drive which the oil industry so ably conducted during February and March of 1942, and from there handled to remelting points as required.

Estimates call for a scrap bank of 15,000,000 tons of materials by the end of this year, with the drive to include farm and home scrap as well as that collected by industry.

Battlefield scrap, considered by many as a potential source of much steel-making material, is not expected to reach a volume of more than 20,000 tons a month during the winter. Lack of handling facilities in the ports nearest army activity, and the fact that it is not desirable to tie up a ship for the 10 to 14 days necessary to load it with unclassified scrap will militate against any appreciable tonnage from overseas before next year. Some steel is expected from Sicily and Italy, but the bulk of the wrecked war materiel is so far from port, and loading equipment and manpower so slight that it is evident the needs of the steel industry for the winter of 1943 must be supplied from home sources.

Most oil companies which set up scrap collection machinery last year have continued the flow of scrap as formed, and there is no longer the backlog of years of accumulation on the leases, behind the stations, and in forgotten corners of warehouse yards to make up much of the total which the oil industry must turn in if steel output is to be kept up to desired levels, and the industry, in turn, is to be able to participate more effectively in the distribution of tubular goods, equipment, and maintenance supplies from the overall tonnage produced.

In many of the smaller communities in the oil-producing areas, the oil companies will throw in their efforts with the local scrap committees, in an effort to avoid duplication and to concentrate returns most effectively. Much of the tonnage expected from the oil industry can come only from redoubled effort through the use of maintenance and reconditioning gangs in searching out and making available buried scrap, abandoned lines, and the less accessible obsolete equipment which was left untouched during 1942's campaign because the returns did not seem to justify the effort. For the scrap bank demanded by the steel industry, cost of gathering can not be permitted to deter the collection, as only through the prompt accumulation of sufficient stocks can the threat of a repetition of last winter's shutdowns be avoided.

Illinois Town Halts Field Development

A SHOW-DOWN battle, involving the relative or ultimate authority of the federal government, the State of Illinois, and the town of West Frankfort, Illinois, has developed with regard to the right of Adkins Oil Company to drill acreage leased within the limits of the municipality, and adjacent to production of the West Frankfort field, in Franklin County.

The state has issued permits to the company to drill 8 wells within the corporate limits; but, in the meanwhile, the city judge, with the backing of the city council, has issued a mandamus against the department of mines and minerals to revoke the permits. State authorities have tossed the situation into the lap of PAW—while the company waits for clearance to carry out its drilling program.

The Shift To Oil

IN 1918, most active industrial year of World War I, energy from mineral sources was divided as follows: coal 85 percent, oil 12 percent, gas 3 percent. In 1941 this relationship had changed to leave coal with 57 percent, oil 32 percent and natural gas 11 percent.

In a quarter of a century oil and natural gas had risen from a place of providing one seventh of the mineral energy of the United States almost to the half way mark.

Oil Depletion Tax More Vital Today

By A. R. McTEE, Staff Writer

Despite prospects for oil shortage, Congress may propose elimination of percentage depletion clause from oil from income-tax returns

IN CASTING about for new sources of revenue for the forthcoming tax program, Congress will, in all probability, propose elimination of the percentage depletion clause from oil company income returns. Like the ubiquitous poor relation, this problem seems always to be on hand. The fight to retain the legal right to depletion allowances is an annual one and returns as regularly as the seasons do, or every time a new revenue bill comes up for consideration in Washington.

Even to propose elimination of the clause this year appears more short-sighted than in normal times. With the industry beset by handicaps that are a constant threat to any kind of functioning, much less normal activity, it hardly seems thinkable that it should have to prepare arguments and put forth a fighting front to preserve the status quo on this taxation; and yet that is what it likely will be called on to do. Already there have appeared hints in the public press that elimination of the percentage depletion clause will be attempted when the Revenue Bill comes up.

This publication has protested such action before. In February, we called attention to damage that would result from tampering with the depletion clause. The continued and continuous fight to eliminate the allowance was cited as being likely to "drastically reduce the exploratory effort." We said at that time, "If this clause should be eliminated, the effect of such a short-sighted action would be to cripple the oil industry beyond repair and its first effect would be felt on wildcat drilling." In turn, it should be realized that practically all other industries would soon be paying higher prices for petroleum products or doing without. Vast damage to the whole economic structure of the nation might result.

This was not a wild shot. We had in our files at that time considerable evidence that damage was already being done by the suggestion that the clause might be cut out. Through letters from drilling contractors we learned that rigs were stacked and crews were idle because of unwillingness on the part of operators to risk money for development without knowing that they could definitely take advantage of the depletion rule and the intangible-cost allowance. They were loath to start any activity as long as the U. S. Treasury was discussing depletion rules. In April, a survey by THE OIL WEEKLY showed the depletion tax was considered necessary by the industry.

Depletion, or recognition of the right to charge that part of the reserve of oil in place that has been used up as a cost of production, has been acknowledged since the early days of the industry. The Excise Tax Law of 1909 treated it as "depreciation." The first Revenue Act, passed in 1913, provided a "reasonable allowance for the exhaustion, wear and tear of property arising out of its use or employment in the business not to exceed, in the case of mines, 5 percent of the gross value at the mine of the output for the year for which the computation was made." No reference to oil or gas was made in that act, however.

Depletion, as such was first defined in the 1916 Act which granted a "reasonable allowance for actual reduction in flow and production," of oil or gas.

Congress granted that oil in place represents capital in oil properties and that the industry should have returned to it, free of tax, the actual capital currently consumed, in the Act of 1918. Under terms of that legislation, it was provided that the value of oil in place should be based either on cost, the fair market value as of March 1, 1913, or the fair market value within thirty days from the date oil was discovered.

This bill resulted in much confusion and difficulty in arriving at just allowances. The nature of the oil business was largely ignored in writing it. For instance, as was pointed out in the Kansas Business Magazine, for July, 1943, "It did not take into account the fact that you might pay $5,000.00 or $100.00, or nothing for a lease, and if oil is discovered, you deplete up to the cost of the lease. How then would the oil producer recover the money spent for drilling dry holes, finding small wells whose production will not return the cost of drilling, cost of leases that are later proved worthless? All these expenditures are a part of the cost of producing oil and should be recovered from the productive properties through a fair method of depletion that is just and equitable to both the oil producer and the government."

Under the fair market value system, depletion was difficult to administer. The procedure was for the operator to guess how much oil there was in the ground when a producer was brought in, estimate the value of the oil, divide the total value of the oil by the estimat-

ed number of barrels of oil in the ground, and the result was the depletion unit. Allowance for depletion for the year was the depletion unit multiplied by the number of barrels produced that year.

To simplify this procedure, percentage depletion as it is known today was adopted by Congress in 1926. The 1926 Act provided that 27½ percent of the gross income from the oil and gas produced by a property should be allowed as a depletion deduction, but in no event is this allowance to be more than 50 percent of the net income from the property. The industry still operates under this act.

It is generally agreed by oil companies that the principle back of the percentage depletion clause as it has operated since 1926, is sound, fair and equitable because it provides for the return of capital invested. The Supreme Court has consistently admitted this fundamental right to depletion.

Arriving at the actual allowances on the basis of the 1926 Act is not always a simple process, but it can be done. The fact that it is a workable act, and that from 1926 to 1942 inclusive, through a period of seventeen years, the clause has been retained by Congress in each revenue act, is a sound argument for not disturbing it.

The wildcatter can stay in business only if he is able to discover new sources of oil supply. This year the entire industry is keyed to the effort to find more oil, by wildcatting, deeper drilling in old fields, trying to extend proven areas and by applying all known methods of secondary recovery, in order to bolster rapidly diminishing stocks and reserves. With the year two thirds gone and no new oil in sight to speak of, with every state except Texas unable to meet set allowables in output, the situation does have very disturbing, if not downright alarming aspects. Nobody knows what the ultimate in demand for oil will be before the war is won. Certainly it will be higher than the current all-time peak. The demand will be met, but at what price nobody knows. Whether it can be met without serious waste is questionable, for if fields are forced to yield oil beyond the maximum safe limit of approved production practice, much oil will be lost beyond recovery. This waste is what the oil industry and conservation agencies are trying to avoid.

Elimination of percentage depletion allowances would mean that operators could not recover capital invested in searching for new production. If a wildcatter were fortunate enough to get a good well, after drilling several dry holes, return of his capital would be burdened by a tax which is intended to be levied only upon net income. Past or future losses are compensated for by percentage depletion and the operator is enabled to carry on his wildcatting efforts secure in the knowledge that he is not using up his capital when he does find a producer.

Stripper well production would also be affected by loss of the depletion allowance, since these small wells are in most instances capable of just enough output to pay the cost of lifting the oil. With most of them, the percentage depletion allowance is the difference between a profit and a loss.

The oil industry feels that the benefits of percentage depletion allowed to it are no more than allowances made for other classes of taxpayers. For example, certain provisions for agriculture, amortization of defense facilities, earned income credit for individuals and numerous types of enterprises are wholly exempt from taxes. After including the clause in the Revenue Act for seventeen years, it would surely seem that Congress should realize its value to the oil industry and also be able to foresee what will happen, should the clause be eliminated.

As has been pointed out repeatedly, percentage depletion is not in any sense a special privilege. Instead it is a plan or method to arrive at a just and equitable allowance to anyone engaged in the search for oil and gas, to assure him that he will be able to recover at least a part of his capital used in hunting for production. Percentage depletion should be thought of only as a legal right.

Rust Prevention Can Save Idle Metal Parts

By TOM L. TURNER, Staff Writer

RUST has long been the horror of the warehouseman. Thousands of dollars worth of idle material has been rendered useless by the action of rust, many thousands of dollars have been spent removing rust from metal only to find that after removing the rust that some pitted places were present, thereby leaving the material utterly useless. Metal pump parts have suffered severely, especially in those areas in which a high humidiy or salty atmosphere prevails.

One supply company insured its supply of metal pump parts from rust by a very simple and inexpensive method. Immediately upon receipt of a shipment of metal pump parts, these parts were unwrapped and examined for rust. Any rust that was found was removed immediately by buffing with a power driven buffer or by hand with emery cloth. Each part was then dipped in a liquid rust preventative.

Previous to selecting a suitable rust preventative, a representative of a company widely experienced in the manufacture of such material was called in for consultation. The material to be used had to be liquid so that all areas of the metal parts would be reached, it also had to be of such composition that it could be removed easily by washing in low grade diesel fuel. Diesel fuel was selected as the washing agent as it was less dangerous than kerosene or gasoline and would not cause the metal to rust as quick as either of the other two. These requirements necessarily required the rust preventative to be of such composition that it would not harden.

The secret of the entire method was in the selection of the proper rust preventative. Numerous preventatives had been tried but only after the advice of a known authority was the proper material selected that met all the requirements.

In the past worn pump parts had been thrown in the trash barrel to be carted off to the junk and trash heap. Now all worn parts are treated as new parts by the above method and laid away so that if necessary, due to scarcity arises, they can be salvaged. These parts may at some time save some operator from having to shut down for any long period of time as old pumps can be patched up until they can be replaced either in part or completely.

The same type of preventative can be used to cover material being stored in the open or under sheds where it is subject to rain, etc. Large items of machinery that cannot be covered by paint can be sprayed with rust preventative, small valves and other material can be dipped although spraying is an easier method.

In this day of scarcity, the preservative of all usable machinery and other material from rust is an important item as maintenance of equipment costs continue to rise.

Believing greater interest in home front responsibilites and improved employee prestige could be created if workers were informed of their part in the war, Humble Oil & Refining Company has conducted a "tell all" incentive program through company magazines, posters and other media. Results are intangible, but company's record output of war products might have been less impressive without the program.

Bolstering The Home Front With Employee Incentive Program

THE high premium this all-out war has set on home front soldiers — on those men and women in factories and fields who produce the astronomical quantities of fighting tools and food needed by our armed forces, on "the man behind the man behind the gun"— also set a parallel obligation squarely in the lap of American industry.

Always interested in efficiency and maximum production, industry was forced to look for new and greater output quickly to meet enormously expanded war demands. But where? Improved and speeded up machinery gave a part of the answer; greater manpower and womanpower, intelligently and patriotically schooled to produce more for America—for freedom—served to complete the pattern.

Behind the greater efficency and greater production of people in industry lies an unheralded but important undertaking, one which helped bring to fruition every American's native desire to be of help. That undertaking is the industrial incentive program, aided by government agencies, conducted on an industry-wide basis by some war industries, or individually created and carried out by many corporations.

Humble's Incentive Program

Of the latter type, the program conceived by Humble Oil & Refining Company before America's entry into the war and broadened to meet changing conditions is both interesting and effective. Faced with the problem that confronted all oil companies, namely that the production of petroleum war products lends itself less to dramatization than does assembly-line manufacture of planes, tanks, ships, and guns, Humble nevertheless pursued its program steadily through various methods and media.

Probably the most uniform and most effective phase of Humble's incentive work has been that in the company's two house magazines, the *Lubricator* and the *Refinery Bee*. Both monthly publications with a wide circulation among employees, they began stressing unity of effort, conservation of time and materials, and the importance of petroleum to the conduct of war even before America became involved.

Less than a month after Pearl Harbor both magazines gave wide publicity to the company's newly introduced Payroll Deduction War Bond Plan, and early in 1942 editorial policies were shaped to keep employees informed about the company's expansion to meet war contracts, to warn them against saboteurs, absenteeism, and loose talk, and to encourage support of the War Bond program. Special sections in both magazines were devoted to news about employees in the service; scrap rubber and scrap metal drives were vigorously supported, with special publicity along lines suggested by government agencies; and in refineries, large poster boards carried dramatic messages on loose talk, absenteeism, and sabotage.

Employees Kept Informed

Impetus was given to the incentive campaign in August, 1942, when receipt of the Army-Navy E Award by Baytown Ordnance Works was heralded by a special edition of the *Refinery Bee*, which was mailed to every employee. From that time on employees were taken into the confidence of the company, so to speak, with more and more details about the company's war work being announced regularly. News articles and editorials pointed out the importance of oil in the war, emphasized the vital part played by each employee, outlined individual responsibility on matters of plant protection, production goals, and operating efficiency, and thus set the stage in the latter part of 1942 for the concerted and unified incentive campaign which was begun early in 1943.

Every phase of publicity was dovetailed into a single program for this year, designed entirely to keep employees fully informed on war production and to arouse their interest in home-front war responsibility.

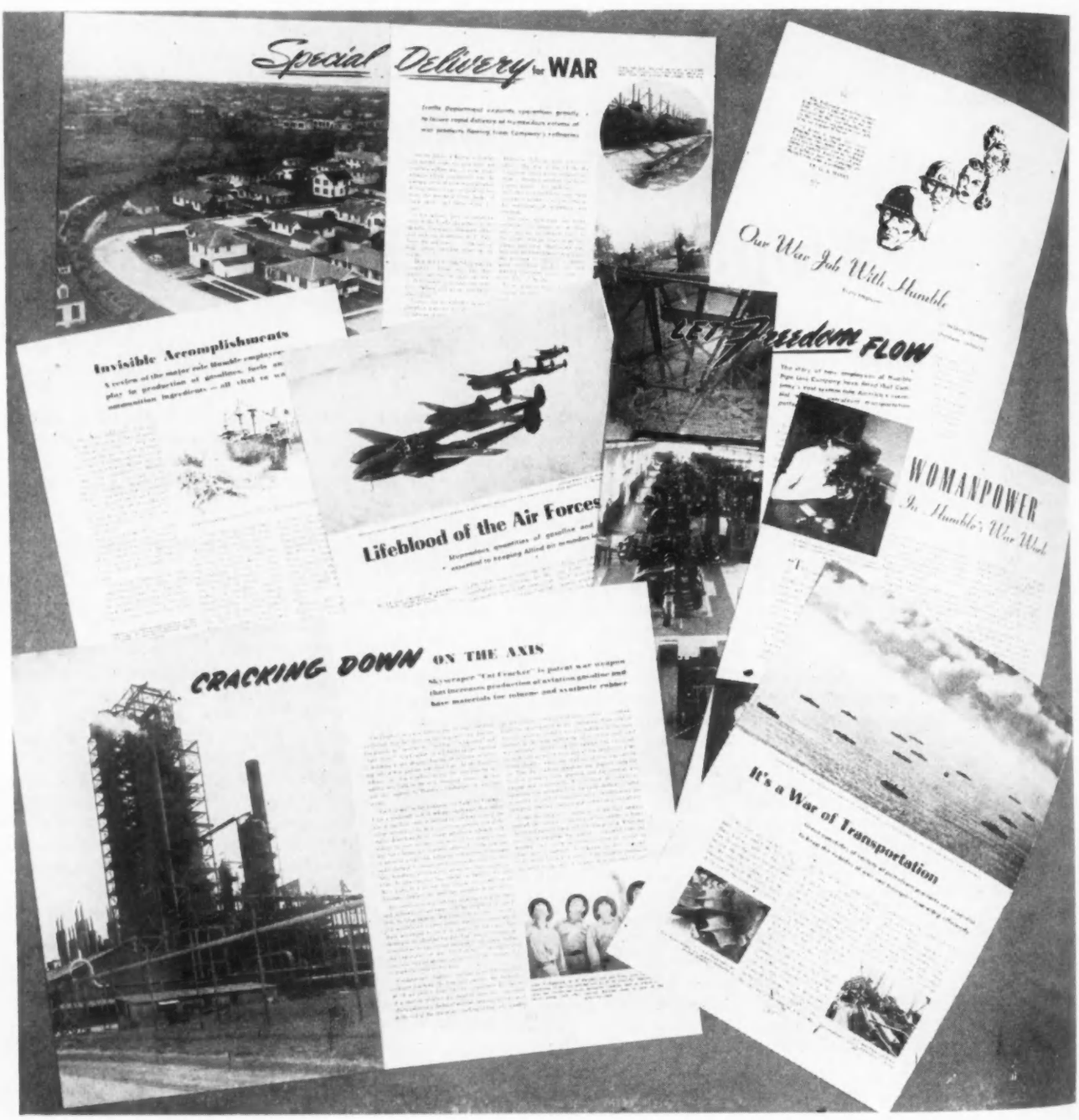
"Our War With Humble" and "In-

visible Accomplishments" were the opening house magazine articles to kick-off the program. The former laid special stress on the importance of the work of every employee, whether directly connected with war production or not; the other explained that petroleum is the lifeblood of mechanized warfare and that it is most essential even though its manufacture into products is less glamorous than the work in shipyards, plane factories, and arsenals.

In the *Lubricator* there followed a series of departmental articles, explaining wartime operational conditions in the Transportation, Sales, Telephone and Telegraph, Refining, and Accounting departments and in the Pipe Line Company. The *Refinery Bee* columns carried articles dealing with new processes, new and converted units, plant protection, and company products on the war front. (Indicative of growing employee interest in this type of material is the fact that the combined circulation of the two magazines has increased approximately 7000 since January 1.)

Supplementing these magazine articles was a series of 15 large advertisements in the daily and weekly press of Texas. Although primarily aimed at informing the general public of the company's war work, they were also directed at creating employee prestige and better informed employees.

"Humble in the Fight," is a liberally illustrated pamphlet containing the president's annual report to stockholders and giving a comprehensive picture of the company's war work, was mailed early in the year to all employees, including those in the armed services. Several months later the Annual Financial Statement was distributed in the same manner.



The company's two house organs are being used effectively in Humble work incentive campaign. Articles stress need for unity of effort, conservation of time and materials, the importance of petroleum to the war effort, keep employees fully informed on war production expansion of the company, and report news about employees in combat service.

Poster boards on Texas highways told the story of Humble employees and Humble products at war; localized incentive posters on company properties brought the message right down to employees more emphatically. Words and deeds of fellow employees on the battle front and telegrams from Army and Navy officials praising production records were employed in these posters to encourage maximum production.

A 40-minute kodachrome motion picture, "Humble's 4-Star War Products," was completed recently and will be circulated throughout the company's operating centers to bring to employees everywhere the refining story of the company's war work.

"Lest We Forget," a Navy incentive booklet, will soon be mailed to all Refining department employees. To localize the booklet, the cover carries a laudatory telegraphic message to Humble refinery employees from C. N. Woodward, Rear Admiral, U.S.N., Chief of Incentive Division.

In the recently closed Third War Loan campaign employees were given extra inducement to lend their money liberally by the company's adoption of a special three-month Payroll Deduction plan in addition to the regular deduction plan of two years standing. Through company magazines and direct mail, employees were urged to organize their own sales campaigns, as requested of industrial workers by the Treasury.

Still another phase of the incentive program publicized through company magazines is the liberal dependents pay provision of the company's Military Service Policy. Complete information about this plan (it pays dependents of men in service the difference between service pay and company pay, up to 50 percent of normal company pay) was given in the hope that it would keep employees at their vital war job with the company rather than having them seek employment in other war industries.

While the results of the overall incentive program are intangibles which cannot be measured in extra gallons of 100-octane aviation gasoline or extra pounds of synthetic rubber produced, it is reasonable to assume that the record output of petroleum war products and the splendid safety record compiled at the same time might have been less impressive without the program.

Many Accomplishments

Suffice it to note a few of the company's accomplishments in the war program.

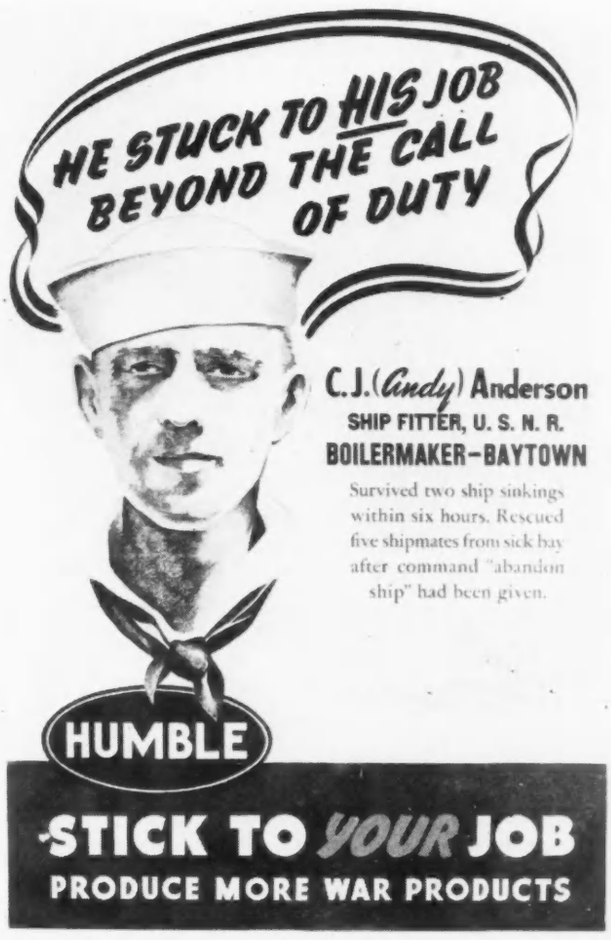
In the nation-wide scrap rubber drive last year, 800 service stations and dealer outlets and 130 bulk stations operating under the Humble sign in only a portion of Texas turned in approximately one percent of the nation's total scrap rubber.

Humble's Baytown Ordnance Works, recipient of the Army-Navy E Award and one star, has produced synthetic toluene in excess of two times the contract rate for more than a year.

Several months ago Baytown refinery passed the 500-million gallon mark in 100-octane aviation gasoline production —more than any single plant in the world has produced.

In the Third War Loan drive, 13,000 employees exceeded the U. S. Treasury's goal for industrial workers by oversubscribing the $100 Bond per employee average.

"KEEP PULLING BOTH TRIGGERS"
Says
Lt. Kermit Beahan
Humble War Veteran
(BAYTOWN TIME OFFICE)
"We're doing our best over there. We want all Humble people to do their best, too. We're in this fight together. You furnish the products and buy more bonds. We'll use the fuels and fighting equipment. . . . AND TOGETHER, WE'LL WIN!"
IT'S A DOUBLE BARREL TRIGGER
MORE gasoline ★ MORE bonds


HE STUCK TO HIS JOB BEYOND THE CALL OF DUTY
C. J. (Andy) Anderson
SHIP FITTER, U. S. N. R.
BOILERMAKER—BAYTOWN
Survived two ship sinkings within six hours. Rescued five shipmates from sick bay after command "abandon ship" had been given.
HUMBLE
STICK TO YOUR JOB
PRODUCE MORE WAR PRODUCTS

Among the posters being used by Humble Oil & Refining Company in its war work incentive program are those that bring words and deeds of former fellow employes now fighting on the battle front, such as the two reproduced here. Others carry messages on loose talk, absenteeism and sabotage. Posters are quite large, being 23 inches wide and 36 inches tall, printed in blue and red color on white paper.

Today's Interesting Tools

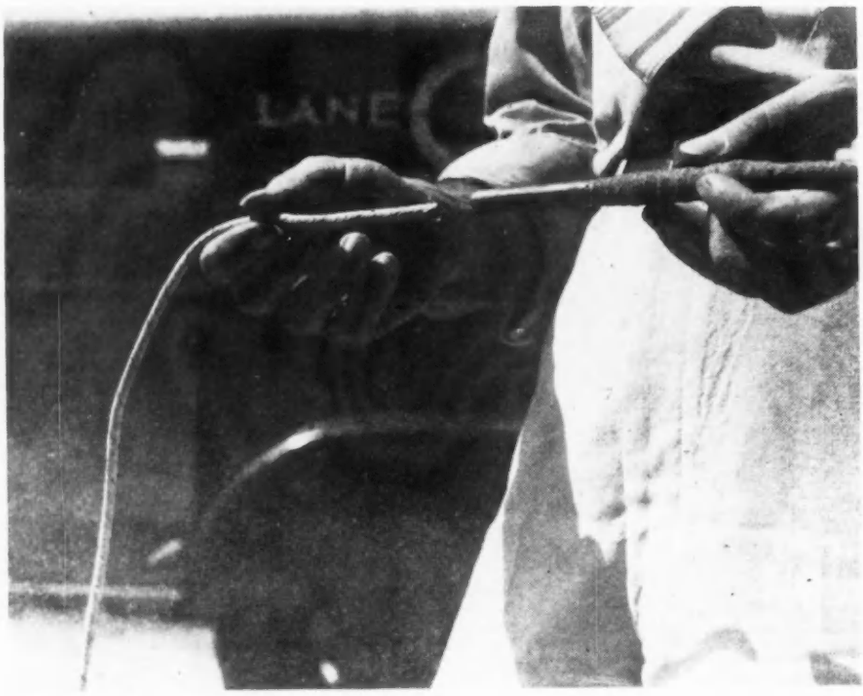
The Explosive Cord

Explosive cord lowered into hole removes mud, rust, scale, wax and other foreign matter clogging openings in perforated liner or casing and screen pipe

EXPLOSIVES long have been used to get or increase production in oil wells. First there was the "shot" to shatter the formation in open hole; then came the gun-perforator to shoot bullets through casing strings into a productive zone. But probably the most unique use of explosives in the oil industry is that of an explosive cord to clean perforated and screen pipe.

This explosive cord has been used successfully in removing mud, rust, scale, wax and other foreign matter that clogs the holes and slots of perforated liner or casing and the openings through screen pipe. It was first applied in California approximately two years ago and has been employed in the Mid-Continent and Gulf Coast areas during the past year. Since the results achieved by use of the explosive cord depend on the pressure caused by the explosion, it was naturally thought that this pressure might be utilized to loosen pipe that could not be pulled under safe strain; and this application of the cord has likewise met with success.

The cord is run into the well on the end of a conductor cable to which it is joined by a special water-proof, firing-head connection. It is positioned opposite the perforations or screen to be cleaned and is kept straight through its length by a sinker bar attached to its bottom end. The cord may be at the bottom of the well or at any one or more places up the hole where perforations are to be cleaned. Under most conditions two or more lengths of cord fastened together in parallel are used opposite the section of pipe to be cleaned and when there are more than one of these sections a single length of cord joins the multiple strands used opposite the perforated sections. The single cord will have no effect on the blank casing connecting the sections to be cleaned. Perforations at two or more places can thus be cleaned at the same time but it is not economical to clean more than one zone per run if the zones are more than 100 feet apart.



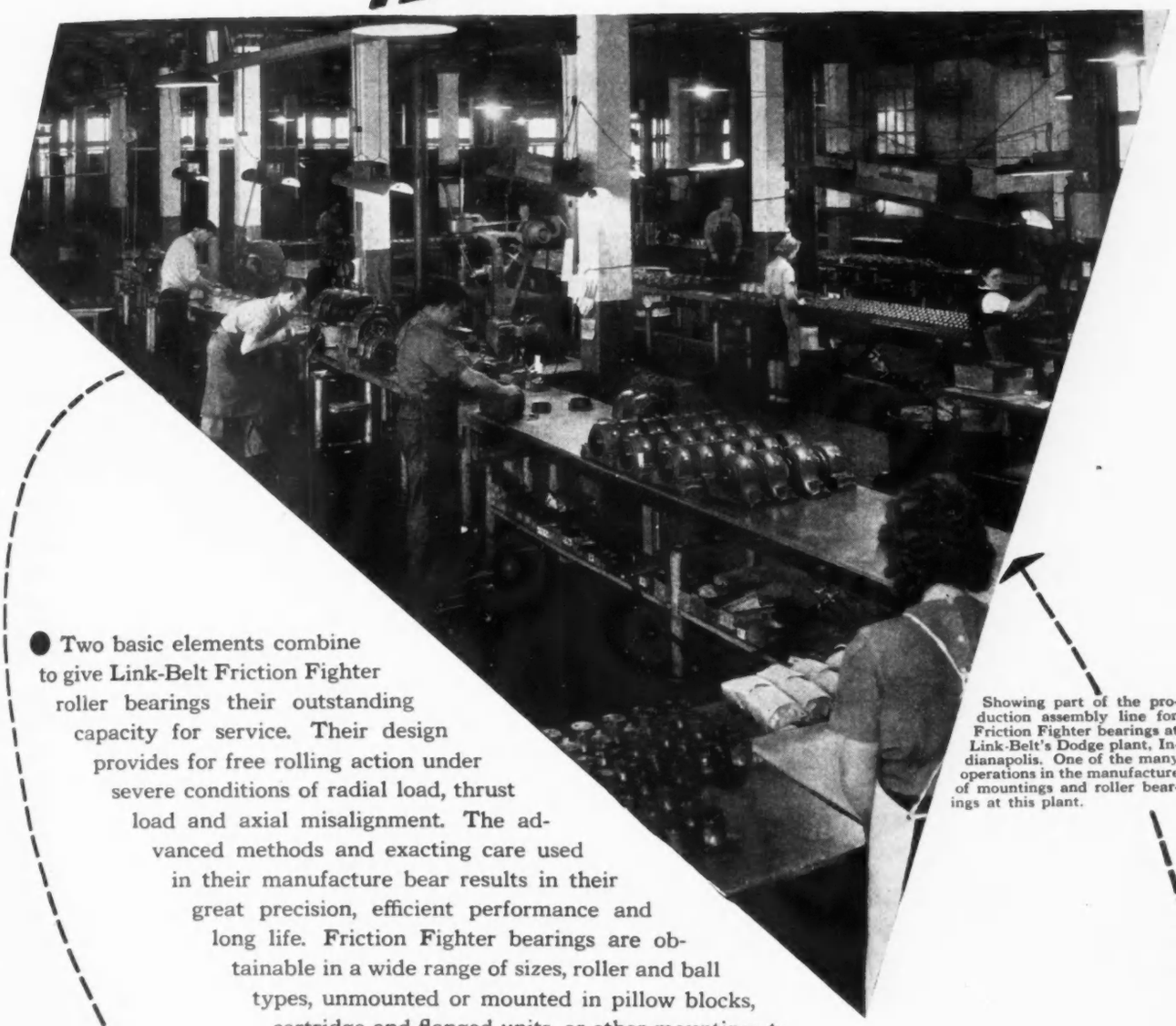
Inserting the cord into the blasting cap fuse. This connection must be water proof so it is wrapped first with a specially prepared rubberized covering then again with friction tape. The Cord appears similar to rope, with the exception of its whitish-yellow explosive core.

The size of the pipe, the condition of the well and the tightness of the formation against the pipe determine the number of cords to use. The majority of the jobs have probably been done with two cords. Regardless of other conditions, only one cord is recommended in zones which are likely to give sand trouble. In one job recently performed to loosen screen pipe, four cords were used and, upon examination of the screen after it was pulled out, it was found that no serious damage had been done to the screen. Only the wire wrapping had been slightly bulged opposite the perforations in the liner.

The cord, weighted at its bottom and attached to the conductor cable, is lowered into the well by a compact hoist unit mounted on a one-ton pick-up truck to which a power take-off has been added. A weight indicator and a measuring device are built into automatic spooling equipment. The equipment and its operation are known as selective well-cleaning service.

The explosive cord is similar in appearance and size to an ordinary slow-burning fuse. There the similarity ends. The cord itself is waterproof and the explosive forming its core is detonated by shock induced at the firing head by electric current transmitted from the surface through the insulated cable on which the cord is run into the well. The cord explodes at a high rate of speed, the speed of detonation being approxi-

UNIQUE DESIGN *Plus* PRECISION MANUFACTURE



Showing part of the production assembly line for Friction Fighter bearings at Link-Belt's Dodge plant, Indianapolis. One of the many operations in the manufacture of mountings and roller bearings at this plant.

● Two basic elements combine to give Link-Belt Friction Fighter roller bearings their outstanding capacity for service. Their design provides for free rolling action under severe conditions of radial load, thrust load and axial misalignment. The advanced methods and exacting care used in their manufacture bear results in their great precision, efficient performance and long life. Friction Fighter bearings are obtainable in a wide range of sizes, roller and ball types, unmounted or mounted in pillow blocks, cartridge and flanged units, or other mountings to suit all conditions of service. Complete description and full engineering data are contained in Book 1775. Write for a copy today. Link-Belt Company, Indianapolis 6, Dallas 1, Houston 2, Kansas City 6, Mo., Los Angeles 33, New York 7, Toronto 8. Distributors in all fields.

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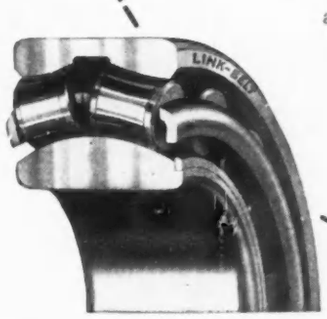


Friction Fighter Series "DE" roller bearings, illustrated, are self-contained and are properly adjusted at the factory, requiring no further adjustment at installation. Their inherent self-aligning and pre-adjustment features make it unnecessary to resort to the use of undesirable, expensive, or cumbersome self-aligning housings. The "self-contained" feature also permits the bearing to be floated axially in the housing to compensate for shaft expansion.

LINK-BELT

FRICTION FIGHTER

BEARINGS

Roller and Ball Types

mately four miles per second. By using the cord form of explosive, the amount of explosive per foot of length is small and is not great enough to damage casing or liner.

The cleaning action results from the pressure caused by the explosion. Due to the speed of detonation, this pressure is applied almost instantaneously to the entire section of pipe through which the cord extends and acts on all clogged openings at once. If some perforations are already open, the pressure still acts on those that are not since the pressure cannot be dissipated through openings fast enough to relieve the pressure on the clogged openings. The effect of the explosion is therefore maximum on all openings and the cleaning action is the same no matter what percentage of the perforations is clogged.

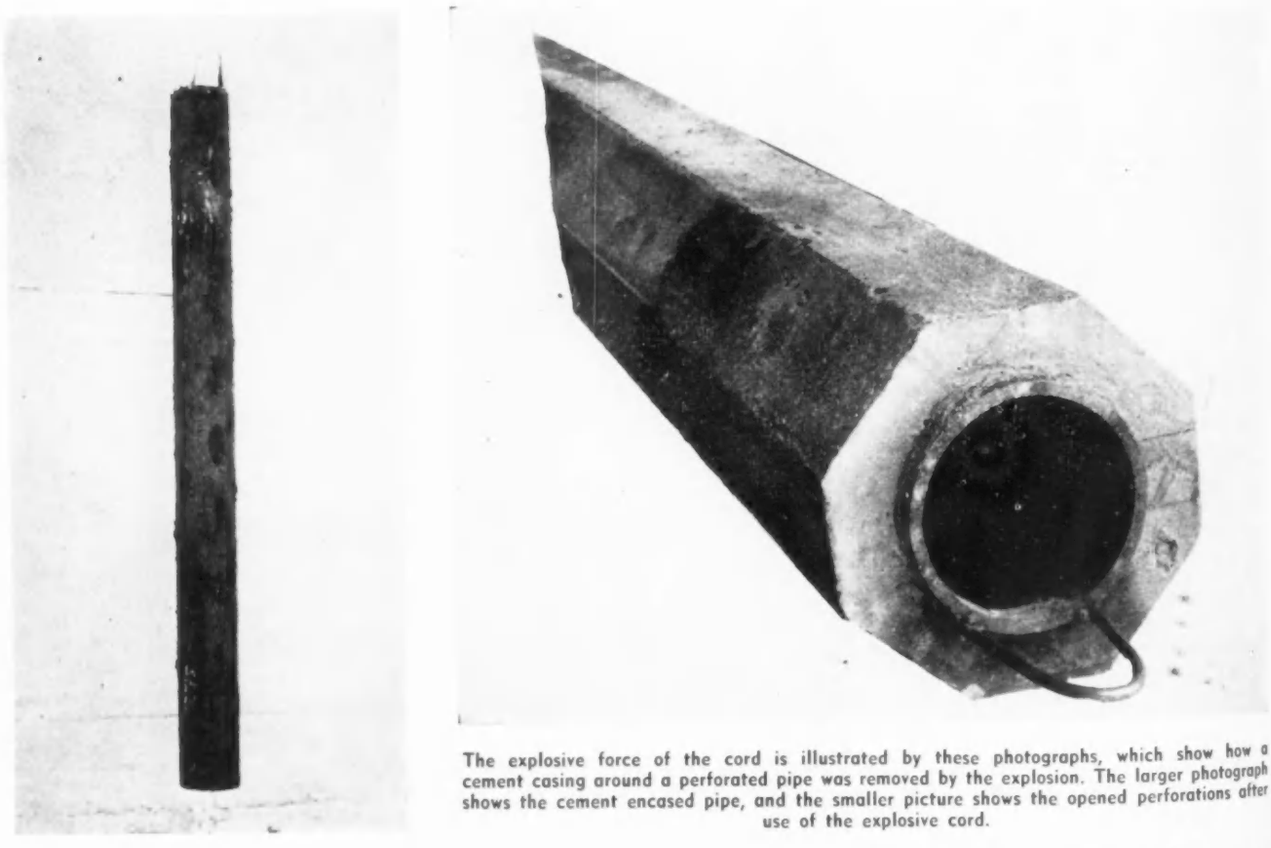
The cord is effective whether fluid is in the hole or not but best results are obtained under fluid. The fluid merely facilitates the transmission of pressure to the openings to be cleaned and thus it makes no difference whether it be mud, water or oil. The length of cord possible to use is limited by the tensile strength and the maximum is approximately 500 feet. This has been exceeded under favorable conditions. Three types of cord based on tensile strength are manufactured and the weight varies from 19 to 35 pounds per 1000 feet with tensile strengths ranging from 113 to 220 pounds. Since the cord requires considerable shock to start the detonation it is relatively safe to handle and shipments are made without restrictions. It can be stored for extended periods of time even in very hot climates. Being water-proof, moisture does not effect it as long as the end for attachment to the firing head is dry.

When the cord is used at great depths the detonation may or may not be felt or heard at the surface. However, assurance that the explosion has taken place is provided by indication of weight at the surface since the cord is weighted when it is run into the well and when explosion occurs this weight drops off and down the hole.

The operators of the selective well-cleaning service using this explosive cord do not recommend it as a simple cure-all that will be effective under all conditions. It was designed for specialized service and a large number of cleaning jobs have substantiated its value, its economy and its effectiveness when the well conditions are suitable. If the oil is present but restricted from entrance into the pipe by accumulations of clinging characteristics such as salt or paraffin or bs or corrosive material —not of a flowing nature such as sand —the cord performs perfectly in removing obstructions and in increasing oil production.

Cleaning the screen of one well in the Gulf Coast resulted in daily production increases from 12 to 37 barrels; in another, from 16 to 45 barrels. In the treatment of wells in one particular field, the first well treated with the selective well-cleaning service did not respond favorably, probably due to failure to use sufficient explosive. However, the rest of the wells so treated responded by greatly increased production in every case. Wells that previously pumped 14 barrels per day produced 25 barrels after treatment.

Concerning stuck casing or liner, the explosive must be opposite the bind retaining the pipe. The location of the cord may sometimes be a matter of guess work and a wrong guess in such cases may mean failure. The usual practice in loosening pipe with explosive cord is to take a strain on the string, run the cord into the well and detonate. The action of the explosion should free the pipe. Using an obstinate case as an example, one producing company desired to pull a screen that had been in a well for four years. Equipment was installed and attempts were made to pull the pipe without success. Taking a strain of approximately 75,000 pounds on the string, the explosive cord, composed of four lengths of 45 feet in parallel, was run to the depth location of the stuck liner and screen. After detonation, no immediate release in strain was noted on the gauge but after releasing and pulling again, the pipe came free.



The explosive force of the cord is illustrated by these photographs, which show how a cement casing around a perforated pipe was removed by the explosion. The larger photograph shows the cement encased pipe, and the smaller picture shows the opened perforations after use of the explosive cord.

Baash-Ross News

BAASH-ROSS TOOL COMPANY · LOS ANGELES · HOUSTON · NEW YORK

OIL WEEKLY EDITION

Make this

RULE NO. 1

of your wartime

fishing operations!

THE ONLY TOOLS TO USE ON TODAY'S FISHING JOBS ARE TOOLS OF PROVEN DEPENDABILITY!

..then check these vital advantages found in Baash-Ross Fishing Tools!

In fishing and repair work the selection of dependable proven tools has always been important. But today it is *absolutely essential*...first, because the scarcity of pipe and other materials makes it doubly foolish to risk losing your well with unreliable fishing equipment... and second, because the shortage of labor and the high cost of rig operations demand that salvage operations be carried out quickly and efficiently.

Baash-Ross fishing tools provide that extra margin of safety and dependability so essential to today's operations because...

1. They are engineered throughout for the most rugged and severe work and embody important *exclusive* advantages that greatly increase their operating efficiency.
2. They have been completely field-proven under types of service far beyond the established range of ordinary fishing tools... at extreme depths, at unusually high pressures and temperatures, on out-of-the-ordinary jobs.

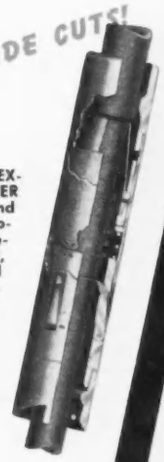
A typical example is the Baash-Ross External Pipe Cutter—the *only* fishing tool in the world that has cut and removed drill pipe as deep as 14,366 ft.—over a THOUSAND feet deeper than the world's deepest producing well. Or the record of this same tool in cutting and recovering over 60 feet of 5¾" *drill collar*—a cutting job *five times* as thick as 6⅝" drill pipe and far beyond the service for which this tool is intended.

This is typical of the type of "beyond-specification" performance built into ALL *Baash-Ross fishing tools—performance that means extra safety and dependability on* ***every*** *fishing and repair job, regardless of depth or operating conditions!*

FOR INSIDE CUTS!

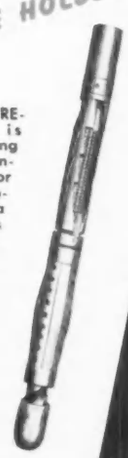
THE BAASH-ROSS INTERNAL PIPE CUTTER cuts tubing, casing or drill pipe with greater smoothness and efficiency because (1) the cutters are unusually close to the supporting slips, eliminating weave and wobble... and (2) feed is applied to the knives *through* a cushioning spring which smooths out all vibration and roughness that occurs in the drill string as it rotates. Any number of cuts may be made on one trip into the hole.

FOR OUTSIDE CUTS!



THE BAASH-ROSS EXTERNAL PIPE CUTTER not only cuts pipe and tubing but also *supports* it while it is removed from the well, eliminating wasted time and extra trips for recovery. Another important feature is that each cut is *automatically spaced* a short distance below a tool joint or collar, thus insuring that the cut is made on the pipe itself—not on the thicker collars or tool joints!

FOR INSIDE HOLDS!



THE BAASH-ROSS RELEASING SPEAR is ideal for pulling casing or tubing, setting liners, backing-off pipe or performing other operations requiring a firm inside grip. This Spear not only has *longer* slips for a better vertical grip, but also *wider* slips for a better grip around the pipe. Its flat-backed slips will not crack or jam or interfere when instant release is required... and uniform grip is assured by an adjustment collar that causes all slips to act *in unison!*

FOR OUTSIDE HOLDS!

THE BAASH-ROSS RELEASING SOCKET, by use of quickly interchangeable parts, takes a firm grip on the outside of pipe, tubing, tool joints or collars. A unique safeguard is that the slips remain fully retracted until the top of the fish is *completely* into the socket, insuring a positive crush-proof grip on the fish... a grip that withstands hours of hard jarring without slipping—yet instantly releases when desired!

CONTROLLED JARRING!

THE BAASH-ROSS KAMMERDINER JAR can be used at any depth and is so completely controlled from the surface that jarring force can be instantly varied over wide or narrow limits to suit requirements. Any number of adjustments in striking force can be made without removing jar from hole... and adjustments can be made either *before* or *after* blow is struck. Combines two most effective loosening actions—an upward jar with slight twist as blow is struck!

Baash-Ross Fishing Tools are available on a rental basis in all major fields throughout the United States. Sold for export only. Call your nearby Baash-Ross representative for full details!

Geology of Central Jackson County, Texas, Oil Fields

Area presents wide variety of structures, including faults, anticlinal folds, stratigraphic traps, terraces and a combination of each

By JOS. HORNBERGER, JR.,
Consulting Geologist and Petroleum Engineer, Houston, Texas

THE most important known oil fields in Jackson County lie south of the Galveston, Harrisburg and San Antonio Railroad, which almost parallels the regional strike of the subsurface formations and passes through the towns of Edna and Ganado. The fields south of this railroad, with the exception of the West Ranch field[1] and the Francitas

The oil fields of central Jackson County present to the geologist a wide variety of structures, namely; faults, anticlinal folds, stratigraphic traps (lenticular or "shoe string" sands), terraces, and a combination of each. Most geologists recognize the horizon at the base of the Anahuac wedge[2] or the first sand stringers of the Greta sand as a fairly consistent contour datum. A horizon just below the top of the Greta sand stringers is used as our datum on the accompanying map (see Figure 1).

Structural Types

The faulted structures producing oil or gas in central Jackson County are two types: the down-to-the-coast or Luling type, and the up-to-the-north type. The West Ganado field is an example of the first type, being a closed structure against a down to the south fault, having several hundred feet of displacement. The Sterling and Stewart fields are examples of the second type, a closure against an up-to-the-north fault. A recently discovered field in the easternmost part of central Jackson County represents a closure on an up-to-the-south fault. The Ganado and Texana fields are faulted anticlinal structures, while the Lolita, North Laward and Maubro fields are purely anticlinal types. Although the Harmon, Mayo, West Mauritz and Mauritz fields present some evidence of closure on detailed subsurface maps, they may be classed more accurately as structures of the terrace type.

Importance of Stratigraphy on Accumulation

The marine shales of the Anahuac wedge forms the cap rock for the production found in both the Greta stringers and the main Greta sand. A marine wedge at the base of the Greta sand likewise forms the cap rock for the production below. This wedge, which for the purpose of this paper, has been named the Greta wedge, gives way to sands further down dip. The interfingering of marine shale wedges between the sands of the Frio below the Greta sand have some influence on the accumulation of oil. Lenticular sands below the Greta are found to be productive of oil or gas in the West Ganado, Ganado, Texana, North Laward, Mayo, Harmon, Mauritz and West Mauritz fields. Certainty of production can not be reasonably assured by the geologist in making a location on the known structures of Jackson County due to the lenticular character of sands below the Greta. In a few fields the strand lines of lenticular sands can be plotted. For an example of strand line fields see Figure 4, illustrating the structures of the West Mauritz and Mauritz fields.

The use of electro-logs has been of great assistance to petroleum geologist in locating lenticular sands, but the core barrel has been of most importance in the location of porous, oil-saturated, bentonitic sandy shale zones. The writer has had the opportunity of seeing the cores of a great number of wells drilled in the county, and some slight shows recovered by the core barrel have yielded far more oil than would be expected from the electro-log chart. The importance of coring in both field and wildcat wells can not be stressed too emphatically, and the importance of drill-stem tests of unimportant shows in both sands and sandy shale cores should be regarded as essential in exploratory tests. Some electro-logs of wells in the Harmon and Mayo and Mauritz fields did not record the porous bentonitic, sandy shale zones saturated with oil. The appearance of oil in the cores, however slight they may be, should be tested with the drill-stem. The bentonitic content and the loose character of the sands encountered in the core barrel will often appear to be poorly saturated. Some of the gas sands, especially those in the Stewart and Sterling fields, have a high percentage of oil saturation.

Valuation of properties producing from the Greta sand, without benefit of an accurate core record, and based entirely on electro-log information is entirely inadequate. A true picture of subsurface conditions can be well represented by a combination of information from cores and electro-logs.

Certain stratigraphic horizons are recognizable below the Greta sand. These horizons are identified by certain oyster shell beds, lignite zones, bentonitic shale zones and lignitic sandy shale zones. A careful observation of the cores in this horizon below the Greta sand will afford the geologist with recognizable members that will be invaluable in locating lenticular sand zones. Figures 2 and 3 represent illustrations of the type logs from the fields covered in this report. The main producing horizon and important oil and gas shows are indicated.

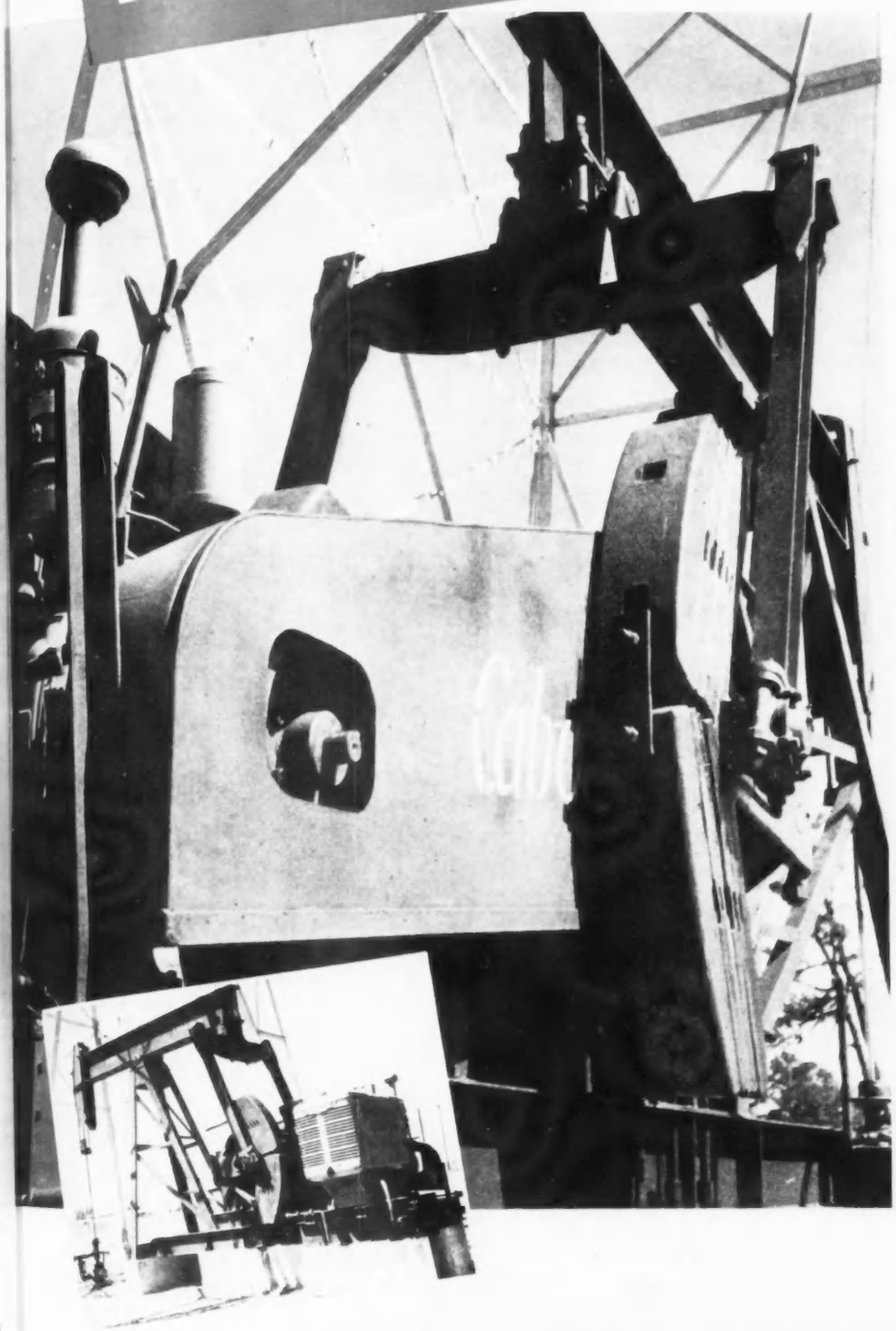
Producing Horizons

West Ganado Field: The principal producing horizon of the West Ganado field is from the Greta sand at the 4700-foot horizon. Several wells in the field have been completed in a multiple lenticular sand horizon occurring from 5150 feet to 5300 feet. The production from these sands is limited in area and are not considered of great importance. A

[1] An article on the West Ranch Field is in preparation by A. J. Bauernschmidt, Jr., for a forthcoming issue of the American Association of Petroleum Geologist Bulletin. field, are included in this discussion.

[2] This paper supplements an article by Dr. J. Brian Eby, which appeared in The Oil Weekly, September 27, 1943. The term Anahuac wedge was discussed by Dr. Eby in his article "The Oil Fields of Jackson County, Texas."

FROM ANY VIEWPOINT



Although Cabot Shops are concentrating on production for war, CABOT surface equipment for the production of oil is available and considered vitally essential.

CABOT equipment is a good investment from any viewpoint, and its adaptability is particularly important now. It can be fitted to the characteristics of any well, like military clothes in the hands of a good tailor. Interchangeable reducers, structures and accessories make the line highly flexible, so that each installation can be assembled for maximum war-time economy and efficiency. The whole industry respects the CABOT line not only for itself, but for the experience, responsibility and service of the manufacturer and distributor.

CABOT installations are never orphaned, even now, by lack of interest or service parts at Frick-Reid stores.

Yes, from any viewpoint CABOT pumping equipment is a good investment.

Made by

CABOT SHOPS, INC.

Pampa, Texas

EXCLUSIVE DISTRIBUTORS

FRICK-REID *Supply Corporation*

"...here's MY warehouse!"

TULSA, OKLAHOMA

blanket sand at about 5400 feet contains gas in a few wells. A lenticular sand at 6000 feet also is restricted as to production of oil and gas to a few wells. Another sand at about the 6200-foot level is found to have oil in only one well in the field.

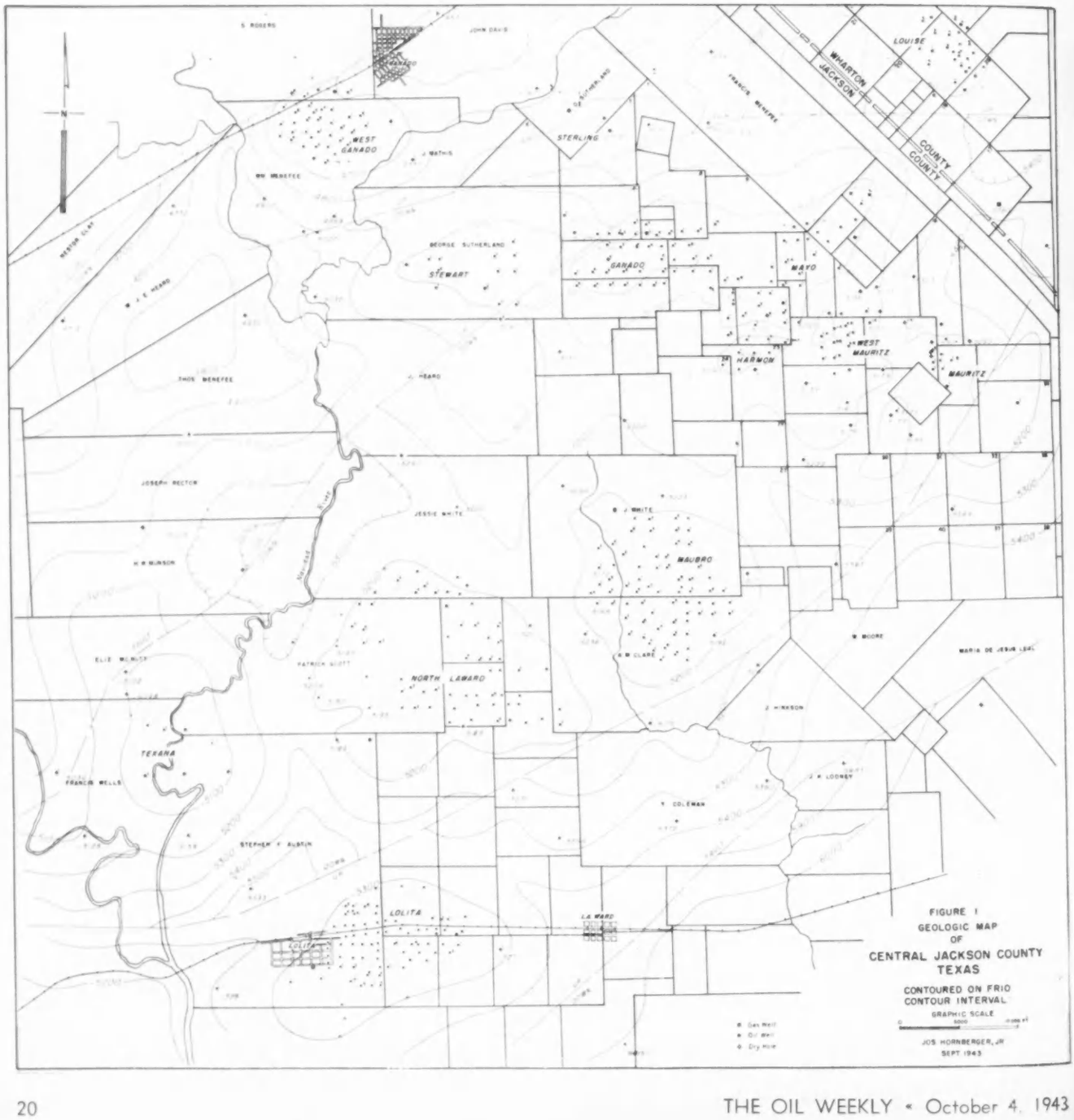
Stewart Field: The Stewart field is producing from the Greta sand at the 4970-foot horizon. Some of the deep wells in the field encountered oil and gas shows, which are indicated on the type log in Figure 2.

Sterling Field: There have been three wells drilled in the Sterling field, two dry holes and one gas well. The principal producing zone is from the Greta sand at 4830 feet.

Ganado Field: The Ganado field was first developed as a Greta sand field from the 5100-foot horizon. Several years after the discovery of Greta production the deeper sands were developed. These are namely, the 5500-foot sand; the 6200-foot sand (producing oil and gas in some wells); the 6300-foot gas sand; a series of lenticular sands from 6400 to 6500 feet producing gas and oil; and two sands at the 6600-foot level producing gas and oil. Two intermediate gas sands are found at the 5700- to 5800-foot levels in the field.

Harmon Field: The Harmon field production is below the main Greta sand. The producing zone occurs at about 5400 feet and in multiple lenticular horizon having vertical range of about 50 feet. This zone apparently is composed of shaley sands and sandy shales having sufficient porosity to produce oil but which are of such a nature that they do not present a clear record on electro-logs.

Mayo Field: Production in the Mayo field was first discovered below the Greta sand at a depth of 5300 feet. Another sand zone which is lenticular in character occurs at the 5400-foot level. These sands present the same sort of record on electro-logs as the sands found in the Harmon field. Some wells on the flank of the Mayo field produce oil from a thin sand stringer in the upper part of the Greta sand at about 5100 feet.

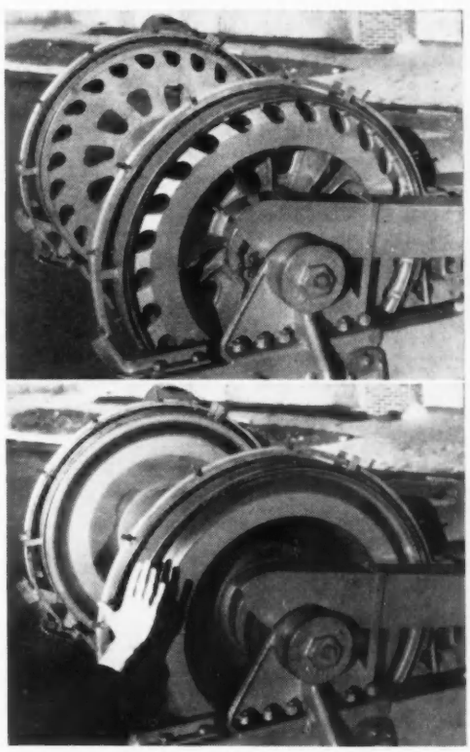


There are AIR BRAKES on A-C Pulling Units also—

When the pilot of a dive bomber starts his "run-in" he depends on the ship's air brakes to regulate his speed and help hold him steady on the target. In 1932 Cooper designed and patented circulating air-cooled brakes for well servicing and pulling equipment, either skid or tractor type. These brakes permit the operator to handle his load smoothly and safely.

The brake drums are made of cast steel. They are scientifically ventilated to accelerate the dissipation of heat. In combination with a well-ribbed interior surface, this design assures a rapid transfer of heat to the atmosphere — consequently, brakes run cool.

The brake bands, on all A-C Well Servicing Units, have a 90% contact on the drums and are self-energizing. Brake actuating mechanism is fully equalized so that maximum uniform braking power is obtained on both drums. There's no chattering under the heaviest loads.



Note: Flow of fast current of air against the friction surface of the brakes. Cool brakes insure longer life for brake linings.

☆

BUY WAR BONDS

—and hang on to them. Buy as many as you can afford. Then cut corners to buy more. Bonds put money to work fighting the war instead of allowing it to shove up prices. They mean safety for you tomorrow. And they'll keep prices down today.

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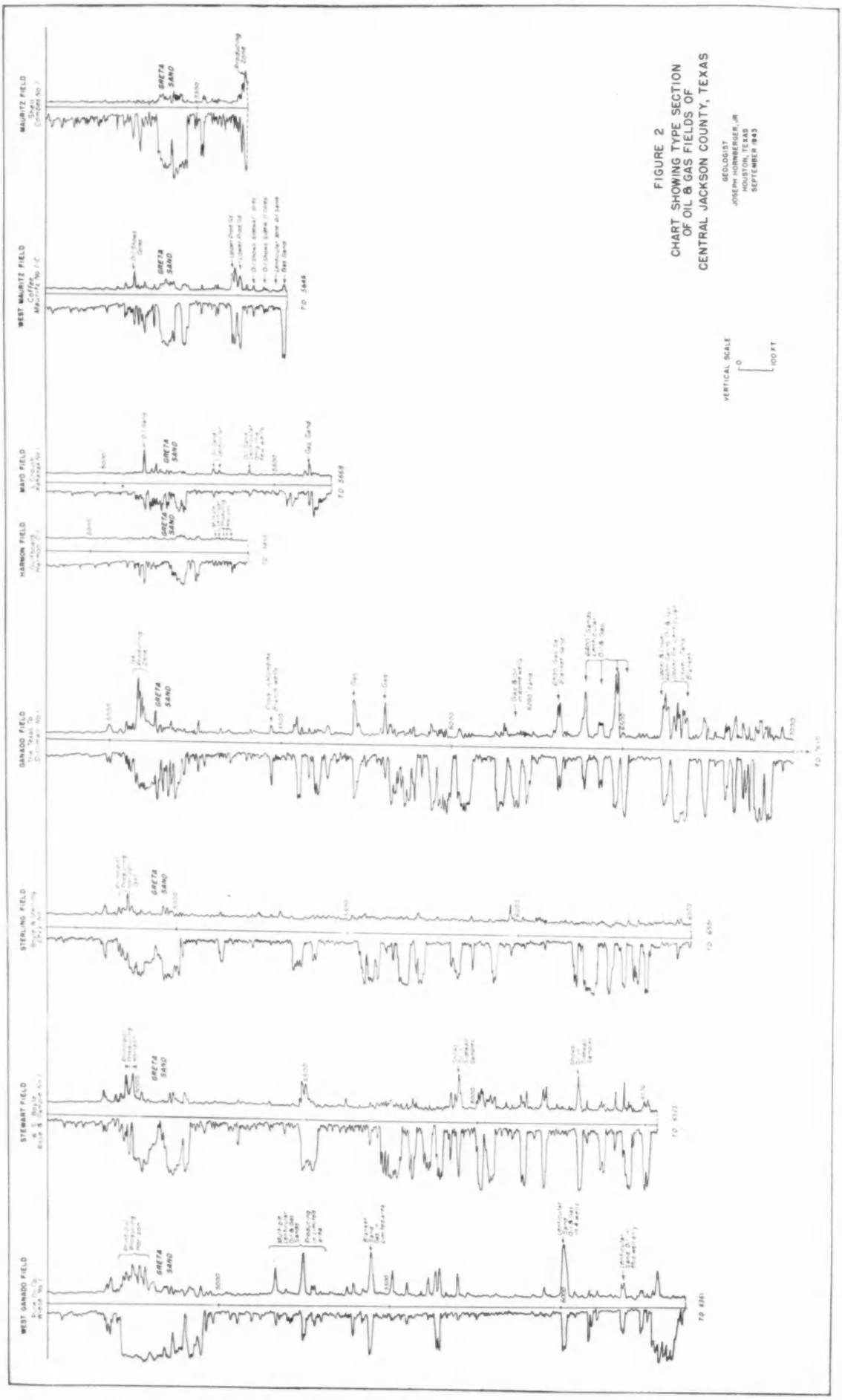


FIGURE 2
CHART SHOWING TYPE SECTION
OF OIL & GAS FIELDS OF
CENTRAL JACKSON COUNTY, TEXAS

GEOLOGIST
JOSEPH HORNBERGER, JR.
HOUSTON, TEXAS
SEPTEMBER 1943

Shows of gas have been recorded in some wells in a sand at 5600 feet.

West Mauritz Field: The principal producing horizon in the West Mauritz field is from two sands below the Greta horizon. These sands occur from 5450 to 5500 feet and are lenticular. Oil shows in cores were recorded in the upper part of the Greta sand and in lenticular sands below 5500 feet. A gas sand is developed in several wells at 5600 feet.

Mauritz Field: The Mauritz field produces from apparently the same producing zone as the West Mauritz field, but at a lower level, namely 5600 feet.

Texana Field: Oil and gas has been produced in the Texana field from the top of the Greta sand stringer at 5050 feet. A multiple zone having gas and distillate occurs in several wells at a depth of 5550 feet to 5600 feet.

North Laward Field: The principal producing zone in the North Laward field is from the Greta sand stringer at 5200 feet. Another lenticular sand zone carrying oil and gas is developed on the north flank of the structure in the 5600-foot level.

Maubro Field: The Maubro field has

FIGURE 5

THE GEOLOGIC SECTION OF WELLS DRILLED IN JACKSON COUNTY, TEXAS & VICINITY

AGE	GROUP	SURFACE	SUBSURFACE & LITHOLOGY	GUIDE FOSSILS
PLEISTOCENE	Houston	Beaumont	Beaumont (clay)	
		Lissie	Lissie (sand)	
PLIOCENE	Citronelle	Willis	Willis (sand)	
MIOCENE		Fleming	Fleming (clay)	
		Oakville	Oakville (sand)	Potamides matsoni
OLIGOCENE	Gueydan	Gueydan	Gueydan: Catahoula (sand); Anahuac (shale); Frio (sand)	Discorbis; Heterostegina (Het); Marginulina idiomorpha (Marg); Marginulina waginata; Marginulina howei; Nodosaria blanpiedi
	Vicksburg	Frio	Vicksburg (shale)	Textularia warreni; Marginulina cocoaensis; Massalina pratti; Textularia hockleyensis; Textularia dibollensis; Camerina moodybranchensis
EOCENE	Jackson	Jackson	Jackson (shale)	Nonionella cockfieldensis; Discorbis yeguaensis; Eponides yeguaensis
	Claiborne	Yegua	Cockfield (sand)	Ceratobulimina exilima
		Cook Mountain	Crockett (clay)	

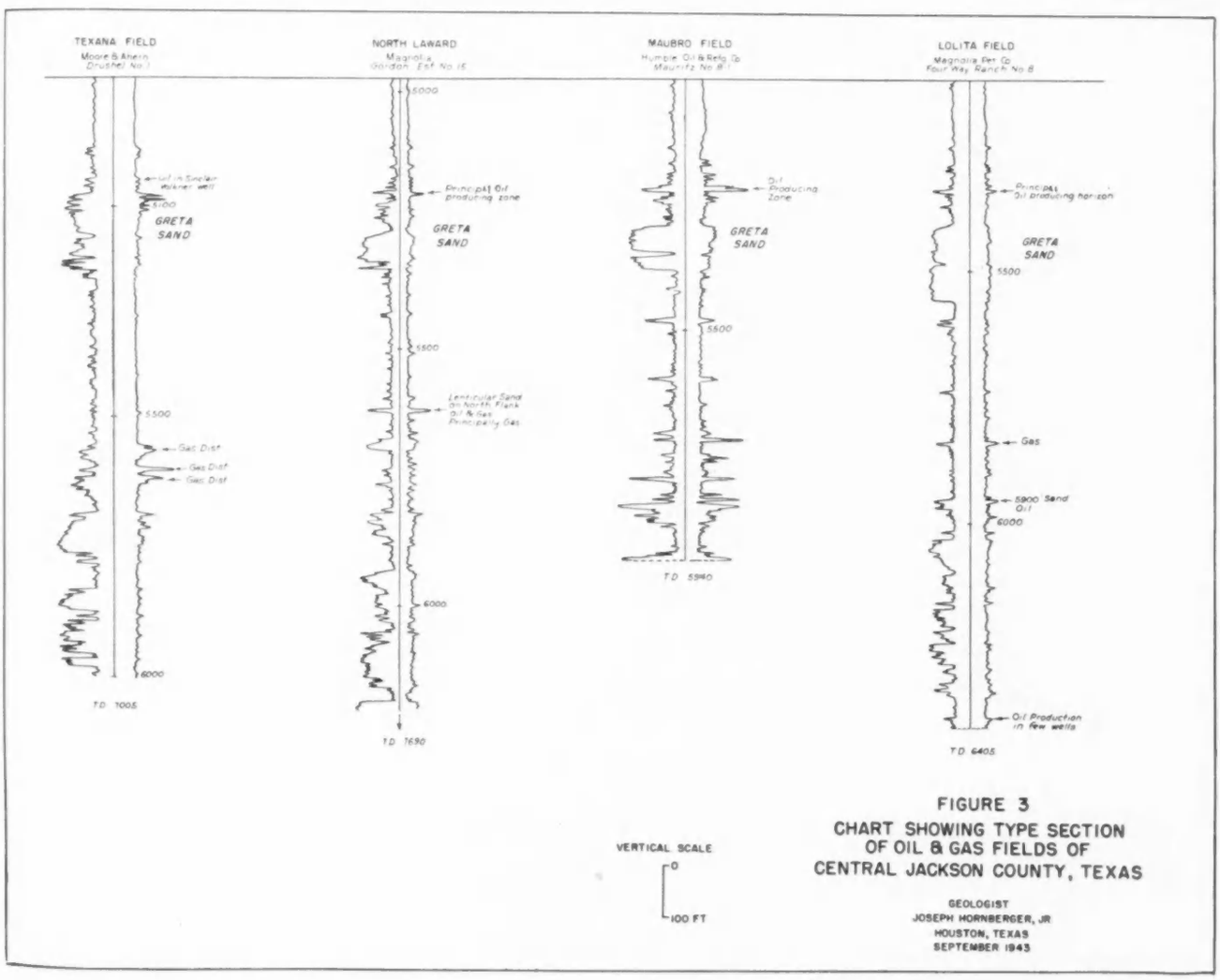


FIGURE 3

CHART SHOWING TYPE SECTION OF OIL & GAS FIELDS OF CENTRAL JACKSON COUNTY, TEXAS

GEOLOGIST
JOSEPH HORNBERGER, JR
HOUSTON, TEXAS
SEPTEMBER 1943

one producing horizon occurring at a depth of about 5200 feet in the Greta stringer.

Lolita Field: Several producing sands are developed in the Lolita field. The first production is from the Greta stringers at 5300 feet; the other main producing horizon occurs at a depth of 5900 feet. Gas sands are recorded on the logs of several wells at from 5700 to 5800 feet. Deeper oil production in a few wells is found at 6400 feet.

General Geological Structure

As pointed out in Dr. Eby's article, "The Oil and Gas Fields of Jackson County, Texas," the principal production occurs between minus 5400- and minus 5500-foot contours. The regional dip from the town of Ganado to Laward is a little less than a thousand feet in a distance of over 15 miles. The flattening of dip indicates a rather large structural feature broken by numerous faults and having some closed anticlinal structures on it. This whole area bounded by the West Ganado field on the north, the West Ranch field on the west, the Lolita field on the south and the Mauritz field on the east may be described as on a large structural feature.

Generalized Subsurface Section

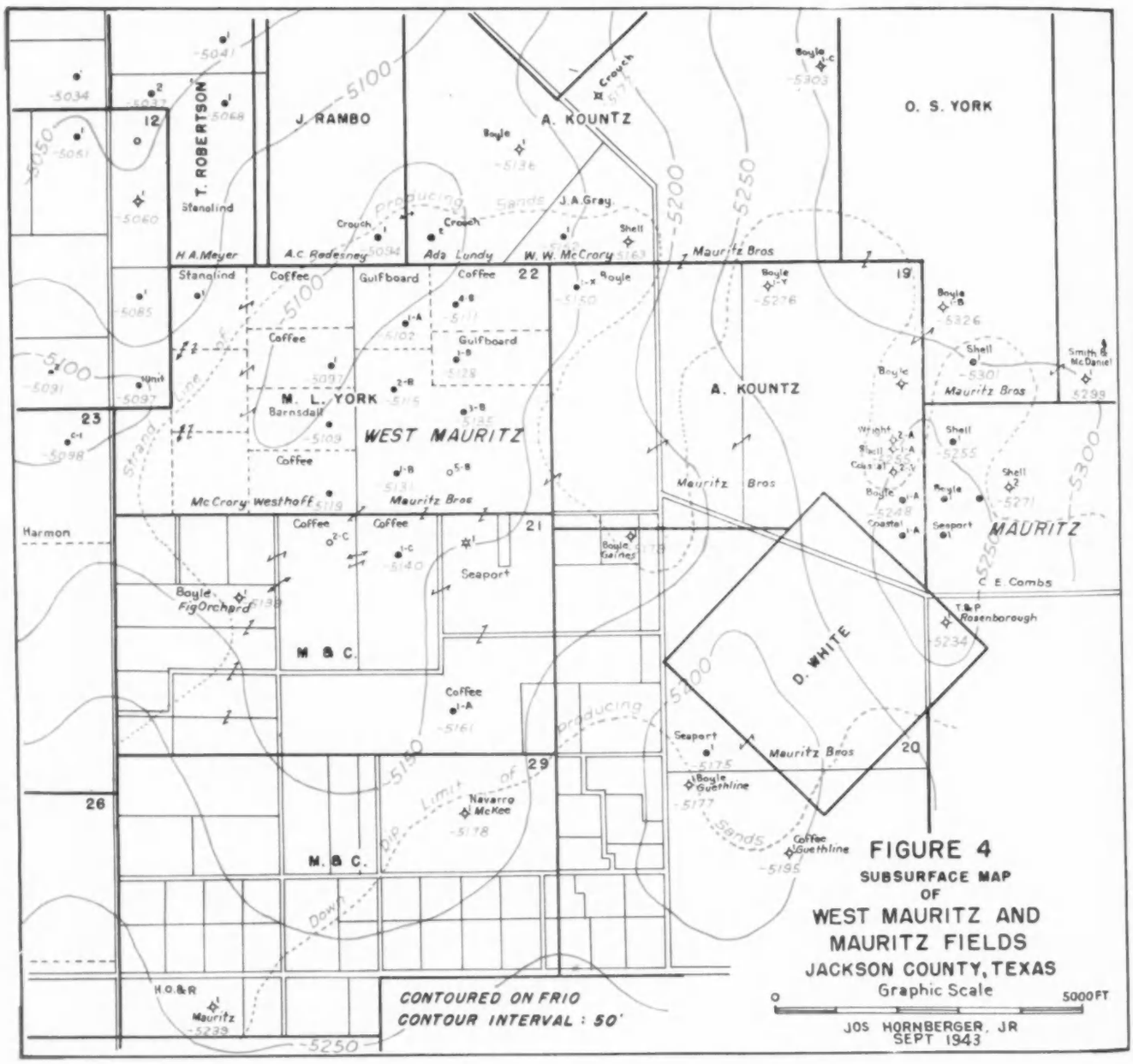
The generalized subsurface geologic section of wells drilled in Jackson County has been discussed in detail in Dr. J. Brian Eby's article in the preceding issue of THE OIL WEEKLY. For the convenience of readers Dr. Eby's geologic section chart is reproduced here (see Figure 5).

Personnel Conference to Be Held in Austin in October

Concrete problems of wartime personnel direction will be up for consideration when Texas personnel workers gather for the fifth annual Texas Personnel Conference, to be held at the University of Texas, Austin, October 21-23.

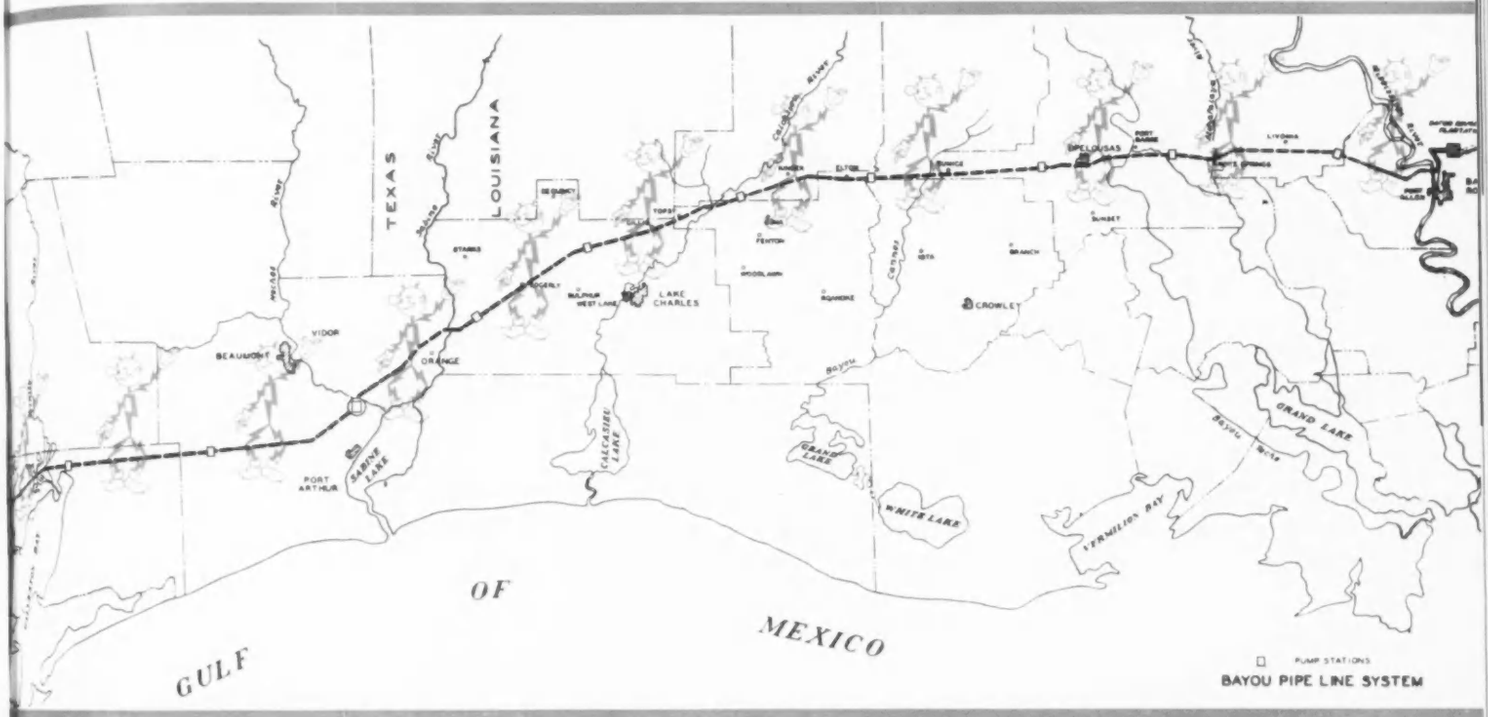
Headline speakers will be L. R. Steelman, director of the labor conciliation service, United States Department of Labor, and Dr. E. G. Williamson, coordinator of student personnel services at the University of Minnesota.

High among the list of problems to be considered are: psychological factors in the training and employment of women; what lies behind absenteeism; minority group problems in war industry; wage and salary stabilization; manpower planning; and next steps ahead in selective service.



Purchased

ELECTRIC POWER HELPS 'BAYOU' DELIVER the GOODS



The Bayou Pipeline System from Baytown to Baton Rouge is using purchased electric power throughout for its pumping requirements.

Nine of the eleven pump stations are served direct by Gulf States Utilities Company and another is served indirectly.

The Bayou job is remarkable in many ways. It was constructed largely of salvaged materials in record time. We followed the example of the builders and finished our part of the job largely with salvaged wire and electrical equipment in record time, too.

As a result the American people again have profited by the efforts of two important private industries working together to get a vital war job done right!—and in a hurry.

GULF STATES UTILITIES COMPANY

DEPENDABLE
GULF STATES UTILITIES CO.
PUBLIC SERVICE

General Offices: Beaumont, Texas; Baton Rouge and Lake Charles, La.

Clarity of Annual Reports

An Industrial Opportunity and Obligation

There can be no future for the enterprise system or for the United States, unless there is a better understanding of the workings of industry. Annual reports can be made an effective means of giving American people a documented story of how and by what they live

By ENDERS M. VOORHEES,
Chairman of Finance Committee, United States Steel Corporation,
Before Controllers' Institute of America

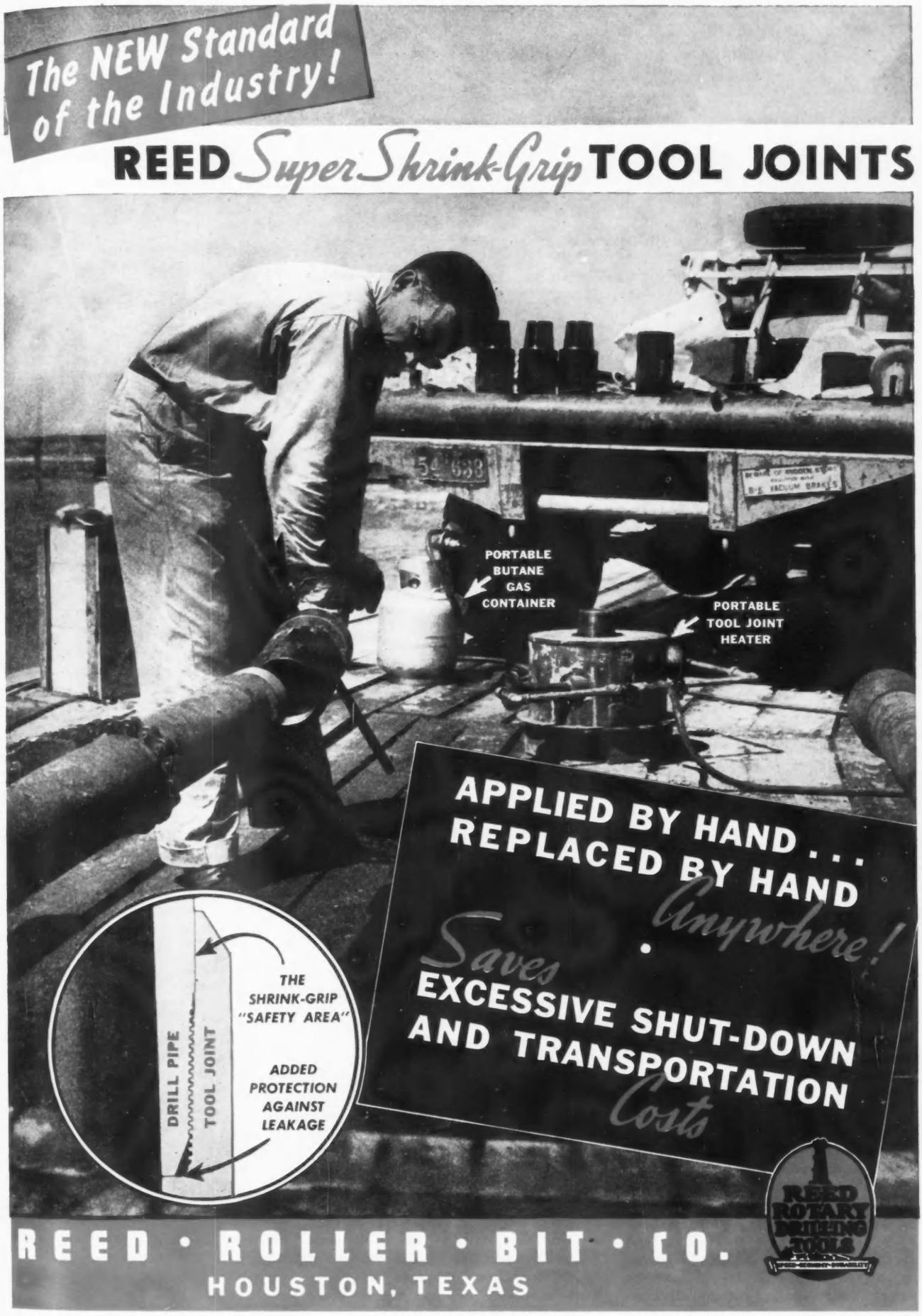
I PARTICULARLY welcome this opportunity to talk with you who are the interpreters of American enterprise about the annual corporation report, because it is largely in your hands to changes in typography, or by adding photographs or cartoons or ranks of little mannequins or piles of dollars, or otherwise pepping up your presentation. carry to the American people the documented story of how and by what we live.

Let me hasten to say that I am not going to suggest that you streamline your reports merely by sprightly changes in typography, or by adding photographs or cartoons or ranks of little mannequins or piles of dollars, or otherwise pepping up your presentation. Neither am I going to suggest that you tell your story merely to evoke admiration as to how good you are and how little room there is for improvement. We have already had too much self-glorification in business. We are not as bad as the odd crew known as business baiters represent us to be—there is just no way of being that bad. But also we are not as good as our gifted advertising men represent us to be—there is just no way of being that good. We are just American citizens charged with the management of properties which usually belong to others. The point that I want to make is that our stewardship is not discharged unless we report our doings in such fashion that the basic social function of our enterprises is clearly portrayed—only then will business be held to the highest degree of responsibility for what it can and should do and not be hampered by being asked to do what is not in its power to do. The annual report is one of the most effective methods of presenting the simple facts to the public.

Now it may not have occurred to you who are so close to the day-to-day accounting that the financial side of business has never been articulate. The products which our companies have to sell are made known to the public by every device of advertising. Insofar as I am aware, no one advocates concealing from the public what he has to sell and most of us endlessly strive to see that our customers make the best use of what we sell to them so that they will find it of greater advantage to trade with us than with anyone else. Likewise we do not hide the candle-light of production under a bushel. Today,

Sales and Costs in 1942 and 1941

	Year 1942	Year 1941
PRODUCTS AND SERVICES SOLD	**$1,865,951,692**	**$1,622,355,922**
This sum was disposed of as follows:		
Wages, salaries, social security taxes and pensions	**782,661,701**	**628,275,135**
Taxes—Federal, state and local	**203,755,157**	**168,645,848**
Products and services bought from others	**648,401,343**	**579,640,279**
Wear and usage of facilities	**128,161,530**	**98,590,187**
Estimated additional costs caused by war	**25,000,000**	**25,000,000**
Interest on indebtedness	**6,153,392**	**6,033,398**
Dividends on cumulative preferred stock	**25,219,677**	**25,219,677**
Dividends on common stock	**34,813,008**	**34,813,008**
Carried forward for future needs	**11,785,884**	**56,138,390**
TOTAL	**$1,865,951,692**	**$1,622,355,922**


The NEW Standard of the Industry!
REED Super Shrink-Grip TOOL JOINTS
PORTABLE BUTANE GAS CONTAINER
PORTABLE TOOL JOINT HEATER
APPLIED BY HAND . . .
REPLACED BY HAND
Anywhere!
Saves
EXCESSIVE SHUT-DOWN
AND TRANSPORTATION
Costs
THE SHRINK-GRIP "SAFETY AREA"
ADDED PROTECTION AGAINST LEAKAGE
DRILL PIPE
TOOL JOINT
REED ROTARY DRILLING TOOLS
REED • ROLLER • BIT • CO.
HOUSTON, TEXAS

those who had so fondly hoped that war production would fall down in private hands and that government would have to take over are in full retreat, for the ingenuity and resourcefulness of private management so infinitely surpass the best bureaucratic management that there is just no comparison. Everyone is more or less aware of the marvels of American production, but how many are aware that production and distribution must be related and coordinated through financial controls, or they will get out of control and smash themselves into bits that may be picked up in a bankruptcy court.

We hear a great deal about production for use as being somehow more desirable than production for what is called profit. Translating that into a simple problem of bookkeeping, we are asked to believe that if everyone produced at less than cost—that is, a loss—we should all be happier. If we remove the dollar sign from a business loss, it turns out that somebody somewhere has rendered services without getting anything in return. This means that this somebody must have not only a benevolent disposition but also must ultimately have the ability to produce and live on thin air. If the art of producing for use involves giving without receiving, it involves the breeding of a race that can live on unrationed air. It is scarcely a compliment to us that lack of accounting clarity has made it possible to discuss social theories which, if run through double-entry bookkeeping, would show up as socially impossible without the aid of an alchemy that could turn a loss into a profit. We as bookkeepers possess the means to show that many of the movements which are blatantly labelled progressive are viciously retrogressive, for they involve taking away and not replacing. But so cramped has our style become that we are leaving the social field to the bureaucrats and reformers who, because they do not have to make ends meet, are limited only by the capacity of thier imaginations.

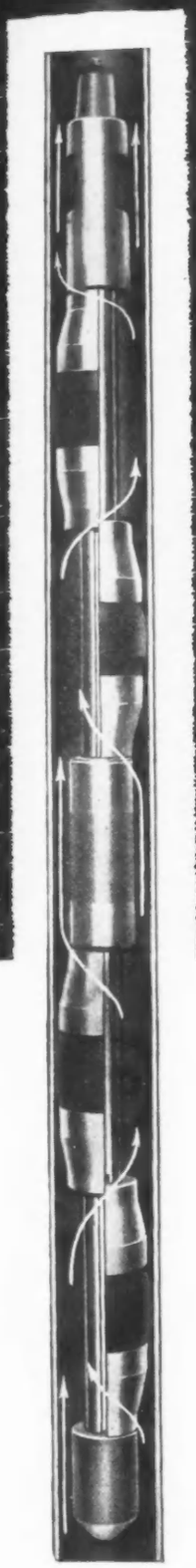
You will please note that I have not yet said that we should "present the case for business" or "for free enterprise." We who are in business are not litigants in a great cause, with the general public as our adversaries. Business is not a thing apart. It is simply the same general public engaged in its own service of supply; and business can no more live in a position adverse to those it supplies than the heart can take a position adverse to the lungs. Most of us are both producers and consumers. There is no one who always sells and never buys. The notion that business is or can be an independent system or power either to take continuously from or supply continuously to the community is absurd. It supposes that business can live in a vacuum—free to do as it pleases about prices or any other matter.

Wages and taxes which increase faster than the slack taken up by efficiency, must be paid for by the customer—that is, by the very people who think they are being benefitted by them. The public and private provisions for old age, accident, unemployment and other liabilities are business costs. They are paid through increased prices and decreased purchasing power. Now I am concerned only with pointing out that business enterprise is not an originating source of funds; it is only an intermediate paymaster and, if its income from operations is less than its outgo, the difference can be made up only by selling off, directly or indirectly, the facilities which must be used for production—that is, by dipping into the seed corn. The relations are not changed by the size of the operations. Sometimes when I look out my office window at 71 Broadway, I can see a chestnut seller with a battered brazier and an old frying pan and sometimes I find myself envying him a little. His basic problems and mine—or those of the corner grocer, for that matter—are quite the same; but he is not called on to do what his tiny resources make it patently impossible for him to do, while I, as the financial officer of a great corporation with assets relatively little greater than his, am expected to do as a public duty what my corporation has not the resources to do. Because my operations are concealed beneath a mass of big figures and he probably has no figures at all, I am presumed to live in a different economic world. In the hope of establishing our basic simplicity, we have defined in our annual reports our own corporation approximately as follows:

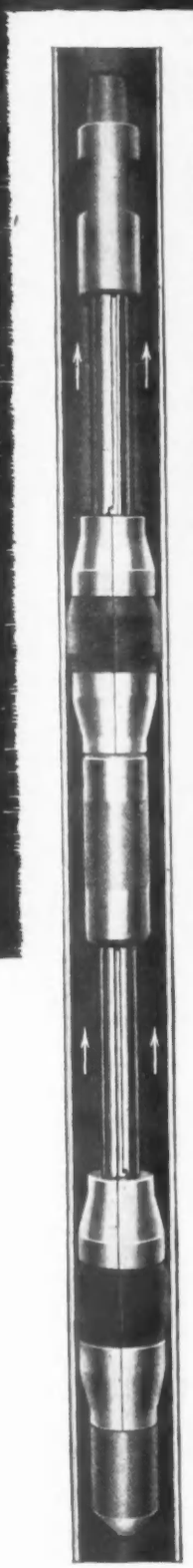
The United States Steel Corporation is not itself an operating organization. Operations are carried on by subsidiary companies, which are members of a great cooperative enterprise in which the savings from nearly a quarter of a million people have been pooled to provide the tools for the creation of products and services in the form of iron, steel and other products. The tools range from tiny and infinitely delicate laboratory devices through manufacturing plants, mines, railways, steamships, warehouses and hospitals, to the common implements which are usually classed as tools. These pooled savings provided the tools for the use of about 350,000 employes. It should ever be kept in mind that only as the public employes United States Steel through buying its goods and services can these tools be called into use and workers be employed to operate them.

Exactly defining the function of a business unit is becoming of extreme importance in these days when so many post-war worlds are being constructed with alternate bricks of fact and fancy. The fancies—and a whole social fabric is being woven out of them—conceive of the paraphernalia of production and distribution as constituting in themselves the source of prosperity. In times of general prosperity, it is true, the machinery of production and distribution goes into high gear and in so doing requires the employment of so large a number of human beings that nearly everyone who wishes work may find it at fairly satisfactory wages. This has brought about the widespread illusion that the whirring of the machinery causes the prosperity and the employment. From this illusion is deduced the theory that it is the social obligation of the owners of the machinery to keep it whirring and to preserve a high level of employment. It is declared, with a finality that brooks no argument or questioning, that when the owners shut down their machinery and discharge men they are solely actuated by the vile purpose of promoting scarcity and preserving profits. It thus appears that depression and unemployment derive from the cupidity and incompetence of private owners, and that the answer is to be found in the selfless competence of the perfect bureaucrats of the perfect state. The complete employment of our facilities in war is offered as conclusive proof that it is within the power of the state to provide complete employment in peace. We are told that, the state having demonstrated its ability to employ, the people will not again tolerate any condition which involves less than a high level of employment and at a high level of wages. It follows, so it is said, that if private ownership cannot justify itself by maintaining these high levels, the state in its ripe competence and even riper confidence will take over. It is rather odd to discover that many of those who call themselves business men and are presumed therefore to be versed in commercial accounting subscribe to the fundamental illusion that we can act as if we have large orders in hand when we only have small orders and therefore find no difficulty in solemnly averring that business has the responsibility of learning how to go forward while operating in reverse—or else.

The "or else" connotes that the perfect state lies ready and willing to take over. If that were the case and if only the cupidity of private owners stood between us and perfect material happiness, I am sure we should all stampede to the arms of the perfect state. But those of us who are in the management of industry know that we are only eco-



DOWNSTROKE
One-half of rubber slides upward, giving exceptionally large fluid passage between rubbers.



UPSTROKE
Rubber half drops back into position, closing fluid passage and lifting load.

MISSION VALVELESS SWABS

SAVE MANPOWER
SAVE MATERIALS
. . . important in total war

1. FASTER SWABBING SAVES MANPOWER

The Mission split-rubber principle provides greater fluid passage which makes for faster swabbing under good conditions, and free falling even when viscous or gas laden fluid is swabbed.

Since the valveless Mission Split-Rubber Swab falls under conditions that stop ordinary swabs, it falls to the bottom and lifts its load more often.

It always lifts a load as there is no valve to stick open or cut out. Rubbers will seat even if blocked open one-half inch.

2. ECONOMY OF MATERIALS

Swab rubbers loosen on the down stroke to reduce friction and increase the life of the rubbers. Rugged rubbers make for longer life, using less of this critical war material.

The Mission swab gives longer service without trouble because of its rugged design with no valve to cut out. Extremely simple construction makes servicing easy.

Mission swabs may be used as paraffin scrappers by simply removing the rubbers—another material saving important in total war.

SAVE TIME, MONEY AND MATERIALS
BY USING MISSION VALVELESS SWABS

FASTER SWABBING
. . . WITH SAFETY

MISSION MANUFACTURING CO.

HUMBLE ROAD, HOUSTON, TEXAS
EXPORT OFFICE: 30 ROCKEFELLER PLAZA, NEW YORK

nomic servants, that we possess no power to employ except as we are employed, that it is simply not in the wood to preserve, much less to increase, earnings by curtailing production, and that we are equally helpless with our employes against the primary power of our customers. We know from our accounts that we can produce and exchange our products only as others produce and exchange with us. For as we all know, the only thing originated by a corporation, independent of exchange, is depreciation.

All of that would be wholly apparent if we simply and intelligibly presented our financial accounts; also it would be wholly apparent that if the state stepped into our shoes it would be in no better case than we are, for, although the items of cost might be shifted and given different names, they would all be present somewhere in the body economic. Government has the force to compel, but its only magic is the seeming magic of taxes and the money printing press and that is good only for a short series of one-night stands. Rather than talk glibly about accepting responsibility—or else, let us try to fulfill the responsibilities which we have, in the faith that thereby we shall all learn the ways of a material organization in which every man gets what is squarely coming to him. By that I mean each gets the equivalent of what he produces—that is the American ideal. Our accounts must aid in realizing that ideal.

Our economy, although it consists of things, has to be expressed in their money representations and it is our job as controllers to keep the things in balance through money symbols. Bookkeeping is not an abstract science and its end is not making the figures on the left page exactly balance with the figures on the right page. But, the only known method of accounting accurately for the production of goods and services is by the use of double-entry bookkeeping. Whenever words are used to arouse the emotions, we should check them for accuracy with our tools of debits and credits. We controllers are not the fifth wheels of business. We are such an integral part of management that without us the management wheel would break and the business vehicle would founder.

Our records are the master tools of our economy and they provide the facts which represent the things that go to make up our economy. Each enterprise is a segment, more or less tiny, of our national economy. The total of our records is the national economy. If each of us presents our segment in understandable form, the total national economy will be understandable and as a nation we shall be in a position to arrange and govern ourselves on the facts, instead of, as at present, by trial and an elementary act of self-preservation, error. That is why I regard the intelligible annual report not as a duty but as and that is also why I regard the unintelligible annual report as an invitation to misunderstanding. I think it is fair to assume that the business which cannot itself intelligibly report to others is not reporting intelligibly to itself.

Not Mere Legality

In my thesis, therefore, the annual report is not merely a legal requirement in which the stockholders, the employes and the public are furnished with a tabulation of bare figures which satisfy the legalities but which give little or no hint as to what the figures mean or how they are arrived at. We ought to know by this time that secrecy in business may be ignorance in business and is only a way of inviting others to do the explaining for us. It is our own fault that we spend so much time trying to catch up with and explain misstatements about ourselves which could never have been made had we clearly stated the facts in the first place. I regard the social obligation fully to report as infinitely higher than the legal obligation. Perhaps it is not quite accurate to use the word "obligation," for really the annual report is more an opportunity than an obligation. Even in the narrowest viewpoint, it is essential to continued progress that the public be given facts so that the workings of industry may be understood. Technically, it can be argued that an enterprise need only report to its owners. But such argument, although technically correct, does not take into consideration public reaction.

The Steel Corporation, I am proud to say, with its first annual report in 1902 broke the tradition that the best corporate report was the one that said the least. We have carried on the principle first enunciated by Judge Gary, and those of us who are now in management have set as our objective the making of an annual report which will tell our stockholders, our employes and the public the results of the year's operations in such fashion that there can be no misunderstanding. We hope that by thus giving the facts we can afford a basis for intelligent criticism which will help us to do a better job and also to make it clear exactly what part we do play and exactly what part we do not play in the national economy.

It had been our custom through the years to present the ordinary accounting reports in considerably more than the required detail, with whatever supporting accounts seemed necessary for a full understanding. We still do that. But in recent years it has been borne in on us that technical accounting and its language tells the story only to those few who have the ability to analyze such accounts and that the accounts did not at all tell the story to the considerable audience that wanted to understand our workings but could not comprehend our accounting language and presentation. Also we found that in certain of our accounts both the nomenclature and the arrangements tended to be misleading to those unfamiliar with accounting technicalities and language. Therefore we have been making over our formal accounts and terminology in order that they could not mislead and we have evolved from them several new presentations which we think tell better the economic story of the year.

There is always an inherent resistance to change in accounting presentation and language and we have had to proceed slowly. We have been grateful for the wholehearted support of our board of directors and of our auditors, Price, Waterhouse & Company under the leadership of that great accounting pioneer, George O. May.

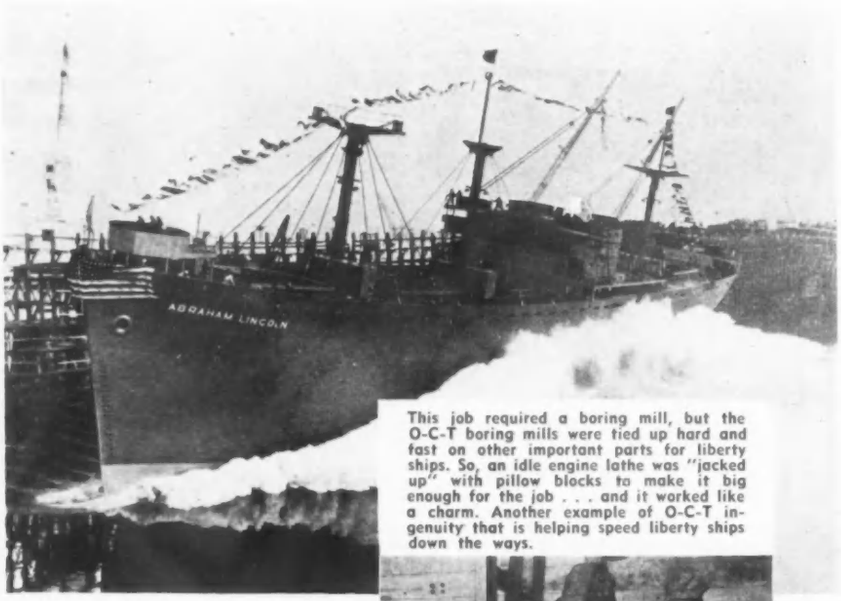
We have conceived of our new form of income account as having one primary function—to focus attention upon the important cost factors affecting the period through which we are passing. And because the several cost factors are continually shifting in relative importance, and new types of costs are being created, the technique of presentation and the language used must provide for flexibility to meet changing conditions.

We view our income account in terms of cost elements which are applicable to every business enterprise, every operation of government, and even to charitable organizations. We seek to deal with the simple account, with credits and debits being paraphrased into receipts and costs.

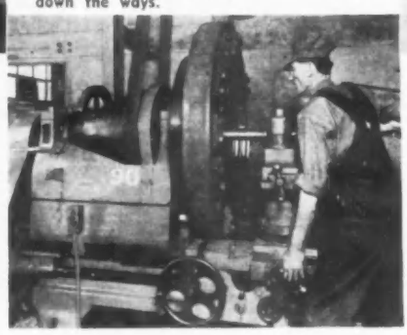
Thus, for the purpose of reporting to the public, our financial affairs consist only of receipts and costs and we have dropped out of all of our income statements the word "net," the word "profit," and the word "surplus" and we have dropped also the practice of drawing sub-totals and making intermediate stops to note "income" or "profits" before this or that payment. We find that these words and intermediate totals divert the attention from the central truths. The words "net" and "profit" imply that a business at the end of its fiscal year comes to a dead stop and therefore makes it possible to determine with finality what is a "net" and what is a "profit." We all know that a business never comes to a dead stop except at dissolution and therefore the figures designated as "net income" or "profit" are not accurate terminal figures, but merely estimates. We hold that there can be only one kind of income and that it is the figure obtained by sub-

"We're Raiding Berlin by Truck"
Posters like these in color are now being carried on our trucks operating in the field to help tell the public about the vital part that seismograph exploration is playing in the war effort.
Independent Exploration Company Houston, Texas
—by Finding OIL for the Flying Fortresses
IXC
FOR THE DRILL
—IX SEISMOGRAPH CREW—
INDEPENDENT EXPLORATION CO.— HOUSTON, TEXAS
EXPLOSIVE
I X Co
HOUSTON TEXAS

Another Nail
FOR THE AXIS COFFIN



This job required a boring mill, but the O-C-T boring mills were tied up hard and fast on other important parts for liberty ships. So, an idle engine lathe was "jacked up" with pillow blocks to make it big enough for the job . . . and it worked like a charm. Another example of O-C-T ingenuity that is helping speed liberty ships down the ways.



Every time a liberty ship slides down the ways, the allied nations edge a little closer to victory. Everyone recognizes the extreme importance of cargo vessels required to keep our own armies and our allies supplied . . . all over the world. And until the U-boat menace is eliminated, these liberty ships will continue to be a critical phase of the war. Oil Center is helping to keep them sliding down the ways by providing essential parts . . . without delay. For that reason, O-C-T men and machines have been converted largely from oil tool production to war production. But when victory is won . . . we'll be back with you again, and you may look forward to even better oil tools under the O-C-T brand.

O-C-T proudly flies the prized Treasury Flag

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OIL CENTER TOOL COMPANY

HOUSTON, TEXAS, U·S·A

Export Representative: Val A. Willick, 30 Rockefeller Plaza, New York, N. Y.

tracting all the costs from all the receipts. It is only confusing to insert sub-totals.

By reviewing in detail the audited form of our income account, I think I can give you in the most effective way a quick summary of our annual report philosohpy in action. In the table covering the year 1942 you see all of the basic elements of cost. Another year, to meet changed economic conditions, the statement might contain one or more new items of special current interest. These figures are for the total operations of U. S. Steel but the basic elements apply to any business.

Basically, we account for all the monies that have been paid to us during the year. That, we believe, is what the public expects us to account for. We are answering the questions: "What did you do with the money we paid to you? Who got what out of the business?" The first major item in our presentation is "Total Products and Services Sold." It is comprised of sales and miscellaneous revenues. It is, in terms of the simple account, the total amount received from our customers. In an ultimate sense, everything below that figure is a cost to the business.

There are three groups — workers, government and owners — vitally interested in these receipts and whatever dollars remain after meeting all costs. In our case the 1942 totals in millions of dollars for these groups were: Workers 783; government 204; owners 60; and carried forward for future needs 12. For each dollar paid in dividends to the owners of the common stock as wages for the use of facilities, the cost of workers was about $22 and taxes were about $6. This three-way division of our receipts, compared with the previous year, shows an increase of 25 percent to workers, an increase of 21 percent to government. There was no increase to owners as wages for the use of facilities and the amount carried forward for future needs was reduced by 78 percent.

It is obvious that any substantial increase in the cost of workers or in taxes could only be met by cutting out the returns to the owners or by asking our customers to pay for it. If there is to be a healthy disposition of production, the future division among workers, government and owners must be based upon more general understanding by all groups of the relations between the worker, the owner of the facilities and the exchange of goods and services which is our economic life.

Thus we have presented our total operations in relation to the primary elements which pertain to all business. Each of these elements is then set forth in detail. The first cost element presented is what we call "Employment

Rigging . . . for the bridge of ships

Hundreds of tons, millions of feet, of Bethlehem Wire Rope are being used in rigging cargo ships for American convoys bound to Britain and the Mediterranean and to the Solomons.

Bethlehem Wire Rope is furnished in every size, grade and construction used on both merchant ships and warships. We are supplying everything from guys and lashings to towing hawsers, elevator cables and hard-running winch ropes. Bethlehem's wire-rope mill is working 168 hours a week to turn out the tremendous quantities of wire rope needed for the bridge of ships, as well as to meet hundreds of pressing war-production needs on the home front.

★ ★ ★ ★ ★ ★ ★ BETHLEHEM STEEL ★ ★ ★ ★ ★ ★

Costs." It comprises wages, salaries, social security taxes and pensions. In our presentation—as distinguished from the traditional accounting statement where such an item is not shown—we have grouped these important costs together. The figure used for wages and salaries excludes the amounts charged to construction. We desired especially to that only as there is exchange of goods and services upon which the whole economy functions can there be employment.

Another major element of cost is "Purchased Products and Services." This represents the sum spent for outside purchases of goods and services in order to do business. Although we had some selectivity as to sources, we had little control over this cost element.

We now come to an element of cost which has been the subject of dispute for many years. You know and I know that the wear and usage of facilities in production—comprising such items as depletion, depreciation, amortization and losses on fixed assets—is a basic cost. Yet what you and I have considered to be modest depreciation provisions have been voilently objected to by many in and out of the government for a number of years. It seems to be the first item on the list for attack when anyone wants to make it appear that more money has been earned than stated. Some, including certain labor leaders and government officials, have even become so confused that they have claimed that depreciation is no part of cost at all, or that it be ignored. Depreciation should be presented for what it is—the cost of the wearing out of the facilities used by the workers.

The next cost element in our presentation is, perhaps, the one about which there is great controversy at the present time, and it aptly illustrates the adaptability of our form of presentation whereby current issues are highlighted. In the traditional accounting language the item has been referred to as a "contingent reserve" or as a "special reserve" or simply as a reserve against specified items. Using such terminology gives a plausible basis for those who attack business to assert that this is nothing more than "additional profit" which has been withheld. Nothing could be more inaccurate. By way of emphasizing the real character of this element, we have termed it in our audited statement "Estimated Additional Costs Applicable to This Period Arising Out of War." This element represents management's estimate of the cost of repairs which because of the high rate of operations must be deferred until a future time and of those costs which will be incurred in the transition to a peacetime basis at the end of the war. There is nothing contingent about such costs; they are a vital part of present costs.

The interest item in our presentation represents, of course, the payment for the use of borrowed savings and is recognized by most, but not by all, of those dealing with business as a proper cost element. The significant point here is that interest is a cost of developing income. We feel that technical or classical economic considerations as to whether interest is or is not an element of cost should give way to the highly practical consideration that interest is definitely one of those costs which are inescapable—assuming the use of any borrowed funds for the purpose of providing facilities for the use of workers.

The final element of cost is taxes—federal, state and local. Let us pause a moment to review the nature of corporate taxes. There are many in our government—as witness the philosophy of the renegotiation procedure—who consider that taxes are not a true cost. Some in the accounting profession in former years have contributed to this view of looking upon income taxes as a share of the net income going to government, thus considering income before taxes as the true income of the business. But the real fact is that taxes are as inescapable as any other item of cost and they cannot be ignored by management in the conduct of the business or the formulation of policy. Since we all recognize the truth of this statement and, at the same time, know from bitter experience that there does exist public confusion as to whether taxes are a true cost, let us review the process which generated the confusion.

The American corporation is the favorite tax whipping boy because it has no effective way of talking back with votes. Let us make it plain that corporations are only tax collectors, taking from the customers for the government. There is a fiction, firmly planted in the public mind as a truth, that the shareholders and not the public pay corporate taxes. We in business tend to confirm the fiction by our habit of expressing taxes as so much per share. It makes the mouths of shareholders water to think what they might have had, were it not for taxes. The item "Profits Before Taxes" included in so many reports—which is only taxes per share in bulk—also makes shareholders wistful. But the effect on the public and their political representatives is quite otherwise. They believe that, if it had not been for the tax, the stockholders would have been pulling down wads of unearned money and they are grateful to their tax watchers for getting to these melons before they could be cut and thus preventing the idle rich from becoming richer and more idle. Both the stockholders and the public are, of course, quite wrong. Corporate taxes are simply costs, and the method of their assessment does not change this fact. Costs must be paid by the public in prices, and corporate taxes are thus, in effect, concealed sales taxes. We do not exactly know the incidence of corporate taxes, but we do know that they have to be paid out of the prices charged, for there is no other source of funds.

This completes the elements of our costs as set forth in the audited statement. Part of the income left after subtracting these various costs may be paid as dividends and the other part may be carried forward for future needs.

In concluding this review of our form of income account presentation, let me define this last item. It is not a "surplus"—which the public believes to be a fund nobody knows what to do with—but is rather a sum which is in the nature of insurance which is as important to the security of the workers and the public as it is to the owners, for it must stand the losses during the periods of bad business, the changes in tools and machinery demanded by scientific progress over and above the sums set aside for ordinary wear, usage and obsolescence, the payment of long-term debt and other obligations, as well as the meeting of emergencies which are bound to occur but which cannot always be foreseen.

The sum left over—to be paid in part to the owners, as wages for the use of facilities, and in part carried forward for future needs of the enterprise—is not a technical cost of operation. Yet it must be clear that, unless there be a return, even though a limited one, to the stockholders who own your company and mine, the damper upon private enterprise will be such that economical financing for future needs is likely to be seriously affected.

In closing—although I do not wish to open up a large, new subject—let me remind you that public opinion is formed by the relatively few. It is not formed by those who read only the tabloids and the funnies. In every shop, public opinion is formed by a small number of highly intelligent workers and the same is true of every community. It is our job to furnish these people with the facts on which they can form their opinions. Ours is not the task to make a case for business, for labor, for management, for stockholders or for any particular group. Ours is always the task to make the case for the truth and the facts as they are and to do it in clear language that will convey its complete understanding.

And unless we do secure in America an understanding of the components of a healthy production and distribution there can be no future for the enterprise system or for the United States. It is a task in which we must not fail. It is a task in which we need not fail.

WHEN BRAKES DUST and SMOKE VALUABLE STEEL IS BEING WASTED!

Steel is vital war material—vitally essential to victory in this finish fight. The importance of saving it cannot be stressed too strong or too often.

Howling, smoking, dusting, grabbing and chattering brakes on drilling wells are warnings that essential steel is being destroyed—wasted. It is caused by the scoring, cutting action of inferior brake lining material, or imperfect brakes, on the highly polished steel drums—drums that are extremely valuable, hard to get, and should be—*must be* protected against this excess wear.

When you order new drawworks, specify Grizzly lined brakes. When your present brake linings wear out—or dust, smoke, grab or howl—

★ RELINE WITH GRIZZLY

Grizzly Rotary Brake Blocks are made to exact manufacturer's specifications for all types of drawworks—CARDWELL—EMSCO—FRANKS—NATIONAL (IDEAL)—OIL WELL—WILSON—and all other makes. Carried in stock by leading supply houses.

GRIZZLY MANUFACTURING COMPANY
(Formerly E. M. Smith Company)
Manufacturing Plants at Los Angeles, California and Paulding, Ohio
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GRIZZLY ROTARY BRAKE BLOCKS

PRACTICAL OPERATING *Hints* FOR THE PRODUCTION MAN

$5.00 will be paid for each illustrated acceptable contribution. Mail to The Editor, THE OIL WEEKLY, *Houston.*

1. FOUNDATIONS

Standardized Forms Speed Unit Set-up

Unitized forms permit quick setting of unit bases and insure proper placing of equipment.

MATERIALLY lowering installation cost of small pumping units on shallow stripper wells, one company engaged in the redrilling of some of its older properties has devised an economical system of laying pumping unit foundations.

Since every well is equipped with practically the same type and size of pumping unit, shape and dimensions of the concrete foundations were standardized, and a demountable wooden form was built which would assure a perfect base, accurately locate all tie-down bolts, and at the same time cut down installation time. Strengthened with angle iron and assembled with tie-rods, the form may be lowered into the excavation by only two men, after which concrete may be poured. By constructing the form in the pyramidal shape as shown in the photograph, at least two advantages result. The form sections may be more easily broken loose and recovered after the concrete has set up, and the completed base, after earth has been filled in around the sloping sides, is less likely to work loose under the continued strain imposed upon it by the pull of the rod line from the central power plant.

In addition, through use of this type of foundation form, no lumber is wasted by being left in the ground around the sides of the concrete block, and the form sections as now used are quickly disassembled and transported on a small truck between locations.

2. FLOOD PROTECTION

Scrap Drilling Line Forms Well Guard

WELLS located near the channels of streams which occasionally flood, and which in spate bring down logs and other debris which could easily damage or even wreck a christmas tree, require protection or must be set upon piers which, in turn, increase the difficulty of servicing and add to well cost.

A California producer encloses wells near stream channels with a guard made from old pipe as posts, with a fence woven from scrap wire line. This line, in pre-Pearl Harbor days, was simply dragged aside from operations and left to rust away and even now, with scrap sought everywhere on the lease, much of this waste wire line will not pay more than a fraction of the cost of cutting, baling and taking to market. The enclosure does serve to fend away logs and debris, and thus permits the continued operation of the well, despite heavy water flow down the channel.

3. LIGHTING

Stair Control Unit Reduces Light Use

Convenient switch reduces service demand on tank lighting circuit without hampering work.

EVEN in areas where dim- or blackout requirements do not demand provision for quick extinguishing of lights on tank batteries and other strategic points, the need for power conservation makes advisable provision for lighting only when gauging or other work around the tanks require light.

One operator laid conduit from the main lighting circuit of the battery to

Scrap drill stem, driven into the river bed around this well, serves to support woven mesh of scrap cable and aid in screening water-borne debris from around well connections.

BRING ON THOSE DRESSERS!

...yessir, coming right up from complete stocks at Dresser Houston Warehouse!

Ready-to-use Dresser Couplings and Sleeves make pipe joining a fast operation day or night. No exact pipe fitting —no pipe-threading. Any workman can make flexible, leak-proof joints—using only a ratchet wrench.

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Few standard parts are slipped over plain-end pipe and joined together by bolts.
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VERSATILE

This indispensable tool has established an enviable world wide reputation by satisfactory performance.

Illustrated model catches and packs off pipe and tool joints and mills over pipe. Single bowl models and other multiple bowl models available.

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LEAK-PROOF CONNECTIONS!

Forged Steel UNIBOLT Couplings employ the most efficient sealing means ever designed for high-pressure steam lines, slush pump manifolds, etc. In addition to the high multiplication of bolt pressure (6½ to 1) provided by the 9 degree tapered shelves, a further reduction is accomplished by the use of a 9 degree taper on each side of the seal ring.

UNIBOLT

THE ONE BOLT COUPLING

THORNHILL-CRAVER COMPANY
HOUSTON

the right-hand post of the handrail to the tank stairway, setting just under the rail an approved switch which, due to its construction, eliminates or encloses any arc or spark which might be made as the circuit is broken and thus provides complete fire protection.

By setting the switch at the same point on each lease battery stairway, it quickly becomes routine for the gauger or switcher to snap on the lights as he starts up to the platform, and as easy for him to extinguish them as he descends.

When a shake-out stand is provided at the tank battery, use of three-way switches, with the second unit installed adjacent to the shake-out machine, saves retracing steps to open the tank battery circuit or the current-wasting decision to "let 'em ride till the next trip" when the battery switch does not lie adjacent to the shortest route back to the office.

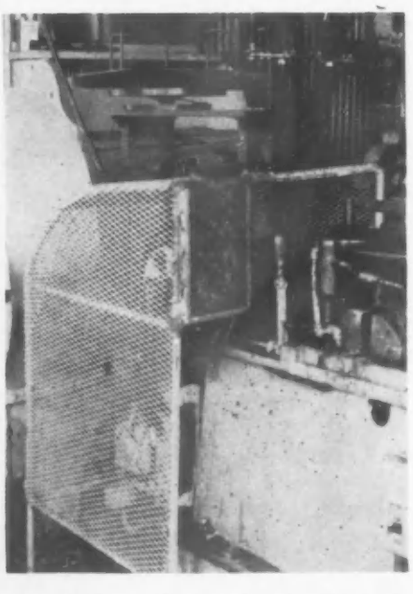
4. SAFETY

Removable Section Avoids Guard Shift

FOR replacing belts, or lubricating bearings enclosed within belt guards, it is frequently necessary to remove a part of the guard, or to risk the accident which the guard is erected to prevent, if attempt be made to service the unit without removing the guard.

By forming a U-shaped opening in the guard at the point where servicing is required, and fitting a sliding member within guides at this point, it is easy simply to lift out the small closure and work over the equipment, leaving the remainder of the guard in place and safeguarding the worker against accidental injury.

A rolled grip at the top of the thin steel plate used to close the gap in the guard makes handling surer and also removes the hazard which would exist were a sharp edge left exposed.



Slottted section of guard frame carries slide which is removed for servicing drive belts.

5. PUMPING

Visible Check Aids Unit Speed Control

Replaceable figures permit revision of specified driving speed on this pumping unit.

CONTROLLED pumping speed is a requirement in maintaining water control, and may greatly extend the life of the equipment by limiting alternating load peaks. In many areas, not only well allowable but also overall production is determined and the strokes per minute carefully fixed to meet the outlined conditions.

With new men to be broken in frequently, with women operating many leases, and with replacement parts for pumping equipment practically unobtainable, one company keeps the proper pumping speed for each unit constantly in front of the operator.

An indicating board, in black with the letters "S.P.M." in white, is hung on the counterweight guard rail, the number being posted in ordinary house numerals to permit an easy change in specifications if the unit is to be rated differently.

Placing the sign on the side of the unit normally approached when checking operation, attention is automatically focussed on speed checking.

☆ ☆ ☆ ☆ WASHINGTON ROUNDUP ☆ ☆ ☆ ☆

THE global oil problem took the center of the Washington stage last week, when Senators returning from a tour of the battlefronts recommended that the strain on domestic production be eased by heavier oil contributions from Russian and British sources and emissaries from Saudi-Arabia made their first official visit to the State Department, presumably to discuss development of that country's reserves.

The senatorial group indicated it would urge Congress to develop a definite oil policy and that it favored substitution of Middle East oil for the American product in the Mediterranean area now in the hands of the Allies.

The larst word in the saga of Mexican exportations was written during the week when the State Department, 5½ years after the seizure of the properties, published an agreement whereby the total cost to the Mexican government will be slightly more than $29,000,000, $9,000,000 of which already has been paid and $5,000,000 of which will represent interest.

Price and rationing continued to receive a great deal of attention in congressional and administration circles, with a hearing before a House Naval Affairs subcommittee at which PAW and OPA officials presented their respective views on the proposed increase for crude and meetings of officials of the two agencies to plan for an increase in the value of Eastern A coupons.

With an increase in the gasoline available for the East, OPA finally increased the value of A coupons in that area but accompanied its action with a reduction in the value of B and C coupons to two gallons throughout the country east of the Rocky Mountains, explaining that this perfected its "equalization" program. Simultaneously, the House Interstate and Foreign Commerce Committee announced that its oil subcommittee would undertake a new investigation of the oil situation, opening its hearings in about two weeks.

Senators Feel Middle East Oil Should Be Used by Army

»

B and C Ration Books Suffer Further Cut in Value

»

PAW Has Hindered Production Says House Committee

»

Mexico to Pay $20 Million for Expropriated Properties

»

By B. F. LINZ
Washington Correspondent

☆ ☆ ☆ ☆

House Committee Charges PAW Has Hindered Oil Production

Charges that PAW has hindered rather than helped an increase in oil production were voiced by members of the oil subcommittee of the House Naval Affairs Committee September 27 at a hearing in which maintenance of present ceilings on crude prices was attacked and defended.

Members of the committee, who recently made an investigation of conditions in the field, called attention to the fact that producers testifying before them had been almost unanimous in their criticisms of the Ickes agency and complained that, if there was another side to the question, nobody had appeared to present it.

At the same time, it was asserted by Representative F. Edward Hebert of Louisiana that OPA, not PAW, actually controlled the oil situation through its price powers, and representatives of the two agencies who testified were asked by Chairman L. Mendel Rivers of South Carolina to file with the subcommittee all correspondence between Ickes and Brown which has not heretofore been made public relating to the effort to secure an increase in crude prices.

PAW's efforts to secure price relief were related by Production Director Don R. Knowlton, whose testimony that he received $8000 a year from the government and $15,000 from Phillips Petroleum Company led to a demand for the filing of a full list of PAW key men, showing who came from major and who came from independent companies and who are still receiving compensation from their companies.

Relating that Ickes originally recommended an average 35-cent increase on April 7, last, made a second recommendation on June 10 and appealed to Director of Stabilization Fred M. Vinson after being turned down by OPA August 7, Knowlton disclosed that no decision has yet been handed down.

He told the subcommittee that military demands will increase greatly next year and "our best estimates indicate that there will be a growing deficiency between domestic production and minimum crude-oil requirements to meet military and essential civilian demands, totaling 337,000 barrels daily by the end of 1944."

Present programs call for meeting this deficiency by increased imports, he said, but pointed out that there still remains the submarine hazard and doubt as to how many tankers can be put into such service.

At the moment, Knowlton said, domestic production is nearly 200,000 barrels a day short of demand. This deficiency is being made up partly by imports and partly by withdrawals from above-ground stocks, but he warned that the latter now are closing to minimum working levels and cannot be depended upon to meet the situation much longer.

Knowlton testified that exploration is at an all-time peak, but that new discoveries are smaller in potential. At the same time, he said, it costs about four times as much to discover new oil as it did before the war, and there have been "significant" increases in labor and material costs in the past two ears, the former being up 26 percent and the latter up 10 to 15 percent.

"Operators, both large and small, are thus confronted not only with higher costs on new production but also in developing from present reserves," he told the subcommittee.

Current profits, he said, are based largely on historical costs and not on those of today, and the industry is in the position of a merchant who sells for $5 goods which he knows will cost $7.50 to replace—and will not replace it at the latter figure if he must continue to sell it at the former.

Spacing Rules Defended

Knowlton admitted that the spacing regulations, criticized by Hebert, "may have something to do" with the situation, but asserted they are being relaxed in the older fields. The most important thing that has been done, he said, has been the expansion of exploratory effort, to secure which PAW has carefully refrained from imposing any controls whatever on the use of material for wildcat wells. The M-68 order, he explained, was necessary to cut down unnecessary wells that were being drilled, "because we just didn't have enough steel in this country for the escort vessel program to use steel that way, but that didn't cut us down in our productive capacity."

Subsidy proposals of OPA as an alternative to a price increase were declared by Knowlton to be unworkable, and members of the subcommittee admitted that not one of the oil men appearing before them in their hearings in their field gave any support to subsidies.

Now cleaning up his work as acting director of the OPA fuel price division preparatory to returning to his regular job as a member of the Securities and Exchange Commission, Sumner Pike expressed doubt of the legality of any action to increase crude prices under both the Price Control Act and President Roosevelt's hold-the-line order.

Pike reiterated previous assertions that the industry had not proven its need for the increase and, he explained, OPA "disapproved the PAW recommendation because we do not believe that to get

the oil we need requires any increase of this size in the price of oil at this time."

He told Hebert under questioning that the price increases in California and the black-oil area of the Northwest had increased production, but contended that the conditions which applied in those sections did not prevail in others, particularly the "punitive" prices which had been imposed on those fields.

Repeating all the reasons previously published for OPA's attitude on the question, Pike asserted that the industry's underground reserve at the end of 1942 was greater than at the close of the previous year. He also testified that there could be no great expansion in wildcatting because all the geophysical crews in the country were already at work, but was forced by Hebert to admit that many fields, including East Texas, had been found without the benefit of scientific assistance. However, he insisted, "both kinds" of exploration are needed.

Pike declared that present production is adequate for the available transportation and that recent discoveries indicate an over-supply for existing facilities, and that the greatest problems of the industry are those concerned with steel and manpower.

The OPA policy of granting relief in specific cases is preferable to a general price increase, he asserted. Figures of OPA show that increases have been granted in 62 of the 74 cases presented.

Final Chapter Written In Mexican Expropriation

The State Detpartment last week wrote the final chapter in the long story of the Mexican expropriations of American oil properties in March, 1938, making public September 29 an agreement whereby Mexico will pay the American owners of the properties $20,137,700.84, in addition to the $9,000,000 paid in 1941.

The department announced that the agreement was reached through an exchange of notes between Adolf Berle, Jr., Acting Secretary of State, and Rafael de la Colina, Mexican charge d'Affaires.

Payments under the agreement began September 30 with a remittance of $3,796,391.04, and the balance will be paid in four annual installments of $4,085,327.45 each.

The total of $29,137,700.84 which thus will represent the payment made by Mexico for properties which the companies contended were worth between $400,000,000 and $500,000,000, represents $23,595,991 plus $5,141,709.84 interest at 3 percent on all unpaid balances from March 18, 1938, to September 3, 1947, the date set for the final payment.

The first payment of $9,000,000 was made on November 19, 1941, when the two governments agreed to appoint experts to determine the just compensation to be paid for the properties. The experts, Morris L. Cooke for the United States and Manuel J. Zevada for Mexico, placed a valuation of $23,995,991 on the losses sustained by American nationals and provided at interest at 3 percent per annum from the date of the expropriation to the date of final settlement on all balances due.

In conformity with the basic agreement the evaluation was final and its terms are carried out by the arrangements announced by the department.

House Committee Bans Talk About Depletion Allowance

Hearings on the new 1943 tax bill will open before the House Ways and Means Committee October 4 with the depletion allowance barred as a subject of testimony.

Decision not to permit any presentation on depletion or certain other subjects was reached by the committee in a pre-hearing conference, and is seen as a warning to the Treasury Department not to make another effort to secure elimination of the allowance and a notice that the position of Congress has not changed on this matter.

Over a period of several years, the Treasury has attempted to show that the depletion allowance is depriving the government of large needed revenues, but neither House nor Senate has ever evinced any sympathy with its position.

With discussion of depletion prohibited, no repeal provision will be incorporated in the bill to be submitted by the House, and it is expected that the Senate Finance Committee will likewise rule it out.

Senators Suggest More Oil from Middle East

Development of a definite congressional policy on the conservation of oil reserves may be sought in the near future by Senators who, during the recess of Congress, made a 40,000-mile air tour of war fronts.

Disclosing that they planned to seek an executive session of the Senate so that the results of the trip could be discussed, Senators Richard B. Russell of Georgia, James M. Mead of New York and Ralph O. Brewster of Maine who, with Senators Albert B. Chandler of Kentucky and Henry Cabot Lodge, Jr., of Massachusetts, made the tour, said that oil was one of eleven matters on which legislation was needed, on the basis of what they had seen in the several theatres of war.

Senator Mead declared that the United States has only 25 percent of the world's petroleum reserves but is furnishing 60 to 65 percent of the petroleum products being used on the war fronts, and suggested that now that the Mediterranean is in allied hands, both Great Britain and Russia should contribute a larger share of oil products.

The largest refinery in the world is the British plant at Abadon, Iran, Senator Brewster said, adding that it could increase its output by 40 percent.

Middle East oil also is expected to bulk largely in conversations between State Department officials and the foreign minister of Saudi-Arabia, Amir Faisal.

Potential producer of a great volume of oil, Saudi-Arabia is said long to have been the subject of consideration by the administration, one outcome of which was the visit of Brigadier General Patrick J. Hurley to that country last spring as personal representative of President Roosevelt, to insure the concession giving the United States exclusive right to its production. The concession, it is said, was secured for The California-Arabian Standard Oil Company, jointly owned by Standard Oil Company of California and The Texas Company.

The current meetings between the Saudi-Arabian emissaries and the State Department, it is understood, were an outcome of Hurley's trip, and are expected to concern the securing of materials and machinery for development.

At PAW, Ickes, asked about the Middle East situation, said, "We have been working on that for some time. We are going to work something out," but refused to go into detail.

Politics Blamed for Oil Price Increase Refusal

Charges that politics have vitiated efforts of the Office of Price Administration to avert inflation were offered last week as a major reason for the unsatisfactory position of the crude branch of the oil industry.

Warnings by union leaders that if oil prices were increased labor would demand its share were said to have been one of the reasons for the refusal of OPA to lift the general ceiling, reflecting the results of an Administration policy of attempting to control prices without imposing any curbs whatever upon labor or agricultural prices.

Officials who could not be quoted because of their government positions criticized several facets of the Administration's industrial control policy, including the division of authority over the oil industry between the PAW, WPB and OPA, and pointed out there was little the first-named could do to improve the situation without the authority of one or both of the other agencies.

The decision to fight a crude-price increase, it was intimated, was made by a higher authority than the Price Administrator in conformity with a policy under which OPA cannot hope to prevent inflation but can attempt only to slow down the percentage by which costs increase.

The present OPA policy of according relief to operators in specific instances was criticized as a price-control expedient which eventually must fall. It was pointed out that in only a few instances have applications from individual fields been rejected, and it was contended that eventually all of the fields in the country would have applied and secured increases which, because they did nothing to iron out disparities between fields would result in bringing appeals for further "relief," setting up an endless spiral of inflation.

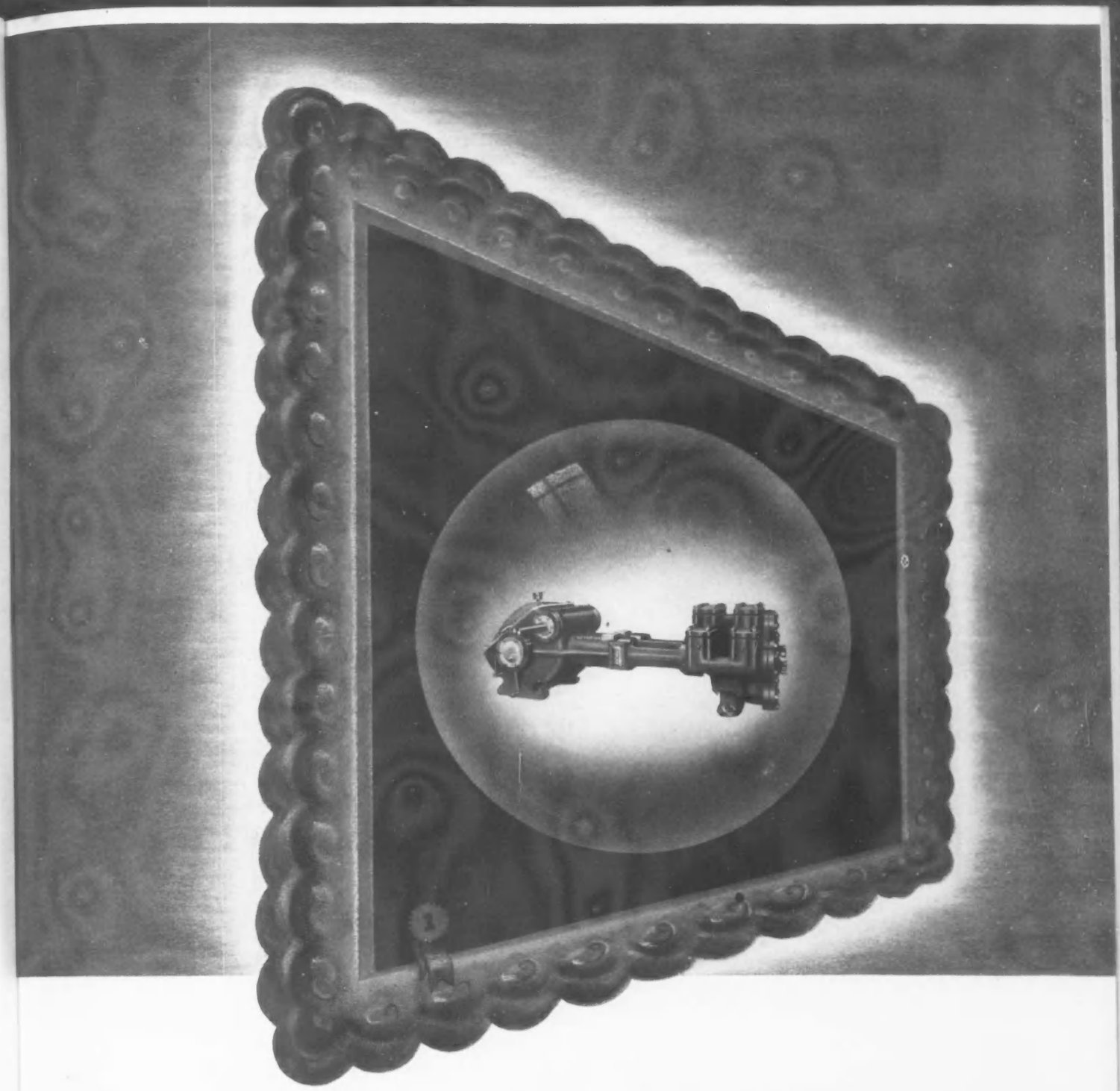
These officials saw little chance of a change in policy before next year's elections. Then, they said, it may be too late for effective action.

Steel Drum Demand Creates New Crisis

A new crisis is developing in the steel drum supply, as a result of suddenly increased demand from the claimant agencies, it was disclosed last week by WPB.

The increased requirements have resulted in a condition whereby a considerable tonnage of the steel allotted under the controlled materials plans for making drums for the current quarter cannot be booked by the steel mills because their schedules are already filled.

Some additional steel may be made available through the use of cold-rolled steel sheets, it was said, and a study is being made of the availability of other substitutes, but without much optimism.



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GASO PUMPS

FOR EVERY OIL INDUSTRY NEED

East Gets More Gasoline; Midwest and South Less

The oft-hinted increase in the value of Eastern A coupons was actually granted by OPA September 30 when, on the basis of increased allocations by PAW, it raised the weekly allowance from 1½ to 2 gallons.

At the same time, OPA "equalized" rations throughout the country by reducing the value of B and C coupons from three to two gallons in all sections east of the Rocky Mountains, explaining that since car owners outside the East were required to use one gallon of their A ration for business before being granted B or C books all now had the same amount for non-essential driving.

Needless to say, the new order was no more satisfactory than any which had preceded it, and even before it was issued, acting on the well-based reports of what was to be done, Chairman Clarence F. Lea of the House Interstate and Foreign Commerce Committee announced his special oil group would immediately undertake a new investigation of rationing and distribution.

Hearings will be opened by the subcommittee in about two weeks, Lea said, and the inquiry will reach into all of the agencies dealing with oil to determine the reasons for the restrictions and their effect upon all parts of the country.

At the same time, the subcommittee will go deeply into the question of crude oil supply and distributors, and is expected to make another of the well-rounded reports on which Congress has relied for oil information and guidance for a number of years.

Changes in coupon value by OPA were based on certifications by PAW of the amount of gasoline to be available for civilian use during the final quarter of the year, in which the Eastern states were given 379,000 barrels a day, an increase of about 34,000 barrels or 10 percent, while the Middle West was reduced 2.5 percent to 467,000 barrels and the Southwest was given a slight increase to 145,000 barrels daily.

The rationing problem was the subject of several conferences of oil officials during the week, including one with War Mobilization Director James F. Byrnes at which the whole situation was thoroughly canvassed.

At his weekly press conference, Ickes reported that East Coast stocks again increased during the past week, standing at 43 percent on September 25 as compared with 59.6 percent on the same date last year. Tank-car shipments, he said, also are improving, showing a gain of 53,236 barrels daily over the preceding week.

Reserve Corporation Kicked Around Again

Petroleum Reserve Corporation, set up last June by Secretary of Commerce Jesse H. Jones as a subsidiary of Reconstruction Finance Corporation and transferred to the Office of Economic Warfare by executive order July 15 following the Wallace-Jones fight, has again been transferred, this time to the Foreign Economic Administration, established by another executive order by consolidation of the Lend-Lease Administration, OEW and Office of Foreign Relief and Rehabilitation Operations.

Under the order, Secretary of State Cordell Hull is empowered to set the policy line to be followed by FEA, the powers and functions of which, the President stipulated, "shall be exercised in conformity with the foreign policy of the United States as defined by the Secretary of State."

In transferring OEW to the new agency, the President ordered that it take with it the corporations and agencies, including PRC, transferred to it by the July 15 order, but there are indications that Petroleum Reserve Corporation may operate more or less independently of the FEA.

PRC, of which Ickes is president, currently is housed in the Interior Department and there is no indication that Leo T. Crowley, given the post of director of OEW in addition to his work as Alien Property Custodian and now administrator of FEA, evinced any intention of any control over the oil effort.

The agency, however, will work in close harmony with the State Department, Secretary Hull being a member of the board of directors, and since it will operate in a highly specialized field it is likely that no effort will be made to merge it with the other agencies under Crowley's control.

The Budget Bureau, however, has been asked by Crowley to rule whether the agencies should be merged as one organization or maintained independently, and until the bureau's determination is received no changes will be made in the present set-up.

Closer Spacing Allowed Michigan Shallow Fields

Closer spacing in Michigan shallow fields is provided for in an order issued over the weekend by PAW as an amendment to Supplement 7 to PAO 11.

The order permits: The drilling of wells up to 1400 feet deep on 10-acre tracts instead of 20-acre up to 2000 feet as heretofore; drilling of wells between 1400 and 2500 feet deep on 20-acre tracts; with 40-acre spacing for deeper wells; and also reduces from 330 to 300 feet the distance the well must be located from the nearest unconsolidated property.

The new spacing will be applicable in Allegan, Barry, Berrien, Branch, Calhoun, Cass, Kalamazoo, Kent, Muskegon, Ottawa, St. Joseph and Van Buren counties.

The closer spacing, it was explained, is designed to promote additional production close to refining and consuming centers and also to encourage the development of the irregular formations throughout the area which could not be worked under the previous pattern.

Production of More Pipe Sizes Authorized

Production of additional sizes of casing and tubing is to be permitted by WPB under an amendment to Limitation Order L-211, issued September 28.

The amendment adds to the list of permitted sizes on 8⅝-inch seamless casing, five sizes of lap-weld casing and three sizes of standard non-upset lap-weld tubing.

The order also provides that the restrictions on sizes and specifications shall not apply to any oil-country tubular goods specifically authorized by WPB, or for which an order was entered prior to last April 30 and shipped before June 30, or to casing produced by electric-fusion welding.

It also provides that the restrictions shall not prohibit the waiver by the purchaser of any of the inspection or test requirements of the specifications; the delivery or acceptance of goods which because of errors in manufacture do not conform to requirements, provided such requirements are waived by the purchaser; the production, fabrication, delivery or acceptance of lap-weld casing with V-type thread, or the production, fabrication, delivery or acceptance of goods having thread dimensions or types of joints other than those prescribed, if the purchaser makes an appropriate endorsement on the purchase order that special threads or types of joints are necessary to the successful installation and operation of the pipe, and that standard threads and joints cannot be used.

Ceiling Price Set For Pipe in Ground

The ceiling price for iron and steel pipe in the ground, when sold to a consumer or exporter, is the ceiling price for "reusable" pipe less the cost of lifting, reconditioning and loading on railroad cars or trucks, it was held last week by OPA in an interpretation of the maximum price regulation No. 230 (used iron and steel pipe).

If the seller is unwilling or unable to establish the cost of lifting, reconditioning and loading, it was ruled, the price for such pipe must not exceed the maximum price for "used structural pipe."

It was explained that the ceiling price for 7-inch 20-pound reusable oil-country casing is $73.60 per 100 feet (the same price per net ton) when sold in Zone 4, the Texas oil producing area. The maximum price for this size and weight of pipe in the ground would be the same, less the estimated cost of lifting, reconditioning and loading, but if the seller and purchaser are unwilling or unable to establish a price by that method, the applicable ceiling is that for used structural pipe, or $35 per net ton.

The interpretation points out that under the regulation, "reusable" pipe means iron and steel pipe suitable without further reconditioning for any purpose for which new pipe of prime quality is customarily used and capable of conducting liquids and gases without leakage at a pressure of at least 50 pounds per square inch. For this reason, it was said, the ceiling price for pipe in the ground sold as "reusable" pipe would have to reflect estimated deductions for lifting, reconditioning and loading.

West Coast to Cut Motor Fuel to Boost Aviation

West Coast refiners last week were ordered by PAW to decrease their output of premium gasoline and increase their production of aviation high-octane and all-purpose fuel in anticipation of heavily increased military demand.

Premium gasoline production has been restricted to 10 percent of the total for civilian consumption, and the volume and volability of all grades of civilian product have been set.

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Hearing on Federal Land Unitization November 17

Secretary Ickes has called a public hearing to be held in the Cosmopolitan Hotel, Denver, Colo., November 17, on proposed Interior Department regulations to govern the development and operation as a unit of oil and gas deposits on public lands. The hearing is open to oil and gas lessees, operators, members of the petroleum industry generally, and others who may be interested in or affected by the regulations. It is expected to be in session three days.

Those in attendance may present additional written or oral comments, criticisms, and suggestions with respect to the regulations, in accordance with a published invitation by the department in the Federal Register of last April 10. The interest evoked by the official notice of April 10 has been widespread and a large volume of ideas already has been submitted, Ickes said. After careful analysis these ideas have been found so constructive that it was decided a public hearing should be held.

The date and place of the hearing have been selected to afford a convenient and adequate opportunity to the largest possible group of interested parties. Assistant Secretary Oscar L. Chapman will preside at the hearings, assisted by William Embry Wrather, director of the Geological Survey.

Crude Output Reached High Mark in July

Crude oil production in July hit the highest figure attained so far this year at an average of 4,113,000 barrels daily, the greatest output attained in any month since January, 1942, and 136,000 barrels daily above the June level, it is shown by the monthly report of the Bureau of Mines.

Most of the increase over June was centered in Texas, where a gain of 127,000 barrels brought the daily output to a new record of 1,626,000 barrels. In the Texas Gulf Coast district, a 535,000-barrel average also hung up a new record with output up 35 percent over last January. Production in West Texas increased 47,000 barrels daily and in East Texas 35,000 barrels. Louisiana recovered ground lost since May, with a gain of 17,000 barrels over June.

The bureau reported that 856 wells were completed during the month, 60 more than in June and 23 more than in July, 1942, but that the gain in initial production over June did not bring the total to last year's figure.

"The daily average demand for domestic crude petroleum of 4,181,000 barrels in July established a record and was 105,000 barrels higher than for June," the report stated. "This resulted in a decline of 68,000 barrels daily in crude stocks of domestic origin despite the high rate of production. Total stocks of crude petroleum amounted to 238,346,000 barrels on July 31 compared with 240,601,000 on June 30."

Daily average crude runs to stills again increased, and at 3,893,000 barrels were 27,000 barrels above the June figure. The gasoline yield dropped to 36.7 percent from 36.9 percent in June, but the yield of residual oil rose from 28.9 to 30.3 percent. Finished gasoline stocks declined 4,554,000 barrels, compared 8,423,000 barrels in July, 1942, but the 62,791,000-barrel inventory was 8,866,000 barrels less than finished gasoline stocks on July 31 of last year.

The bureau's statistical analysis showed production for the month of 127,493,000 barrels of crude against 119,302,000 barrels in June, and 7,487,000 barrels of natural gasoline, etc., against 7,252,000 barrels, a total of 134,980,000 barrels against 126,554,000 barrels.

Stocks at the close of the month included 238,346,000 barrels of gasoline-bearing crude against 240,601,000 barrels on June 30; 10,279,000 barrels of heavy crude in California against 10,064,000 barrels; 5,168,000 barrels of natural gasoline against 5,179,000 barrels, and 227,872,000 barrels of refined products against 228,242,000 barrels, a total, all oils, of 481,665,000 barrels against 484,086,000 barrels.

The Bureau of Labor Statistics price figures placed the index for petroleum and products at 62.8 for July compared with 62.6 for June and 60.6 for July, 1942. The crude-oil capacity represented in the report was 4,548,339 barrels, indicating an operating ratio of 86 percent, compared with 85 percent for June and 78 percent for July last year.

Companies Request Stop Orders on Construction

Revocation of preference ratings for construction by three oil companies was announced September 28 by WPB, which explained that in each case the action was taken at the request of the company.

The projects halted were those of Continental Oil Company at Ponca City, Oklahoma, for construction of facilities for the production of close boiling range naphtha charging stock for a hydroformer unit for the ultimate production of toluene, to cost $128,728; Humble Oil & Refining Company, Houston, for facilities for receiving and unloading butylenes at its Baytown plant, to cost $15,600, and Socony-Vacuum Oil Company for increased pumping facilities on Staten Island, New York, to cost $35,650.

Seek 180,000 Tons of Scrap Metal From Oil Industry

A new salvage drive of scrap metal has been instituted by the WPB, with the oil industry scheduled to contribute at least 180,000 of the 9,800,000 tons which it is hoped to collect during the last three months of this year.

In a call to all branches of the industry to cooperate in the drive to secure scrap metal which is seriously needed for the production of steel, Ickes and Davies stressed the industry's own need of steel for its operations as a prime reason why it should make every effort to dig up all the scrap possible.

"Petroleum operators know the importance of maintaining stocks of materials for essential operations," Ickes said. "It is only proper that the industry provide its share of scrap to the Victory Scrap Banks being established throughout the country.

"I have no doubt that the oil industry will do everything possible to meet its quota of 180,000 tons of scrap for the last three months of 1943."

Expressing the belief that the industry would be able to meet its quota without difficulty, Davies pointed out that the regular continuing collection of scrap by oil men amounted to 42,600 tons in July, when no special effort was made to find metal.

No Regulation of Costs Of Reclaiming Oil

Charges for the reconditioning of contaminated petroleum products from ocean-going vessels have been exempted from price control by OPA, effective October 4.

OPA explained that the service of reconditioning contaminated fuel oil and other products has assumed some importance as a result of the war. Usually the service is supplied for the Navy or other governmental agencies or for foreign governments and frequently involves the reclamation of oil taken from ships damaged by enemy action and other causes.

These charges, heretofore frozen at the March, 1942, level, can be exempted from regulation, insofar as they relate to products from ocean-going vessels, without causing any significant increase in the cost of the war or the cost of living, it was said, and the exemption will tend to promote the efficient operation of a service having an important bearing on the conduct of the war.

Officials explained it is not possible to establish a uniform method for the pricing of this service, since each operation differs somewhat by reason of differences in kind or degree of contamination, and the work often is done under emergency conditions which do not admit of the delay that would result in securing OPA approval for every contract.

New Orders Governing East Coast Distribution

New orders governing the distribution of products on the East Coast have been issued by PAW with a view to coordinating all shipments by all importers so that all supplies may be directed to the points where they are most needed.

It is now required that anyone who imports principal products into District 1 must obtain approval for all receipts except those specifically covered in the monthly schedule prepared under Directive 59.

Approval of such receipts will be granted freely provided the importer shows that the product is needed at the proposed destination in relation to other areas within the district, and that the importer will pay to the Defense Supplies Corporation the amounts of the revenue price increases granted by OPA for the purpose of offsetting in part the increased cost of transportation, it was explained by Davies.

More than 95 percent of all supplies on the East Coast have been scheduled and allocated under the provisions of Directive 59, and the new orders will serve to bring under control most of the remaining supplies.

Texas Statewide Hearing

The next statewide proration hearing has been scheduled by the Texas Railroad Commission for October 19, at Austin.

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Dallas Court Denies OPA Power to Suspend Business

A two-week suspension of Good Luck Oil Company, Dallas marketer, ordered by an OPA hearing commissioner last May, because the company accepted 1063 basic A rationing coupons before their effective date, has been ruled unconstitutional by Federal Judge William H. Atwell. An immediate appeal is planned by OPA.

Judge Atwell said there was no doubt Congress validly gave the President authority to allocate any material or facilities to promote national defense, and therefore that OPA had the right to ration commodities, but held that Congress had not delegated any power for OPA to suspend violators.

"The Congress," stated Atwell, "did not vest in the defendants (officials of OPA) such a power as here exhibited. If it did, it presumed to act improperly, which presumption will not be divulged. We must find that it acted constitutionally if possible, and lay the blame where it belongs—on the board.

"The hearing administrator unknown to and unprovided for by the Congress, presumes to conduct a court. Procedure is prescribed by his superior for such conducting. He enters a judgment concerning which there is no limit fixed. No maximum. No minimum.

"He acts without fear of consequences for malfeasance or misfeasance. If he can suspend for two weeks, he can suspend for two years. He not only is unknown to the Congress but he is unknown to the Constitution. Such power is vested in one Supreme Court and in such inferior courts as Congress from time to time may ordain and establish."

Judge Atwell added that as a result of the delegation of authority for allocation because of the declaration of war, there was conceived and born a hearing administrator who is and was without constitutional father or mother.

"No attempt at baptism in the waters of conflict can change his parentage and make it legitimate.

"This view of a penalty or punishment is sustained by a further reading of the allocation act which provides for the criminal punishment of a citizen who violates its provisions and also for equitable restraints, both of which take place in named courts."

State Fights Dismissal Of East Texas Suit

Arguments concerning the dismissal of the first East Texas water-oil ratio suit to reach the appellate courts were heard last week in the Third Court of Civil Appeals. Konowa Operating Company sought to dismiss its suit attacking the validity of the water-oil ratio order.

Konowa obtained a judgment in the trial court, and the state appealed. Gillis Johnson, Fort Worth attorney, representing the Texas Railroad Commission, insisted that the higher court should hear the case in order that a final judgment might be obtained which would determine the validity of this type of commission order.

Chief Justice James McClendon asked Johnson whether a court judgment would be adequate if it provided that Konowa consented that the water-oil ratio order was valid under the marginal-well law, and further, that the court enter a finding providing the reversal and dismissal of the case. An order reversing and rendering judgment would then be entered.

Johnson contended that the court was charged with the duty of establishing a standard to guide the railroad commission, for the purpose of avoiding additional law suits on the same subject.

Charles Black, Austin attorney, arguing amicus curae, the order providing for water-oil ratios is an oil-producing order, not an oil-curtailment or proration order. Therefore, he thought it could be issued without conflicting with the marginal-well law. However, he still contended that the marginal-well law is invalid so far as the East Texas field is concerned.

The case is regarded as a test of the East Texas and other water-oil ratio orders, and its final decision will determine whether this type of order may be made effective in other oil fields.

Tulsa Company Faces WLB Action on CIO Demand

The National War Labor Board was requested by the regional WLB on September 29 to start proceedings to force the Pioneer Oil Corporation of Tulsa to enter into a maintenance-of-membership contract with the CIO Oil Workers Union. Chairman Floyd McGown said that maintenance of membership does not mean a closed shop, as contended by the oil company. "Each employee has the right to decide for himself whether to join the union and his decision shall not be prejudiced by either the employer or the union. The maintenance-of-membership policy of WLB assures each side of not being placed at a disadvantage because of wartime conditions."

Drillers' Draft Deferment Up to Local Boards

Efforts of Texas Railroad Commission Chairman Beauford Jester to have oil-well drillers deferred from the draft resulted in a letter last week from the National Selective Service Commission.

In its letter, the commission pointed out that local boards have the discretionary power to determine the status of all registrants with that board, which of course is subject to appeal.

The commission suggested that employers file written requests for occupational deferment of these drillers. If they are classified in I-A, the case may then be appealed to the board of appeal. If it is affirmed there, a review may be requested by the state director, who will determine whether an appeal to the President is warranted.

Atlantic Buys Producing Properties at Conroe

The Atlantic Refining Company has purchased the capital stock of Gulf Coast Drilling & Production Company (Albert Plummer and D. B. McDaniel) of Houston, for a cash consideration of approximately $5,000,000. Properties owned by the purchased company include 31 oil wells in the Conroe field and undeveloped acreage in the Conroe area. These assets have been assigned to The Atlantic Refining Company as a preliminary to liquidation of the Houston company.

Production from the properties involved will continue to be taken by Tidal Pipe Line Company for the time being.

Texas Commissioner Will Appear Before Congress

Beauford Jester, chairman of the Texas Railroad Commission, said last week that he will appear October 4, before the House Naval Affairs Subcommittee investigating the crude-oil price situation. At the hearing, Jester said he would attempt to answer the statements of Price Administrator Prentiss Brown concerning efforts of OPA to "hold the line" of prices. In order to bring oil prices in line, Jester said that the average should be raised to $1.87 per barrel.

Jester reported that Congressman Mendell Rivers, chairman of this subcommittee, and Congressman Boykin of Alabama, will return to Texas with him for visits in Dallas and Houston. On October 8, Rivers will speak over the radio from Houston urging construction of another oil pipe line from Texas to the Southeastern States.

Rubel to Address Gulf Coast AIME Chapter

A. C. Rubel, vice president and general manager of Union Oil Company, Los Angeles, will address the Gulf Coast Mining and Metallurgical Institute of Mining and Metalurgical Engineers, on Monday, October 4. The meeting has been changed to this date from its customary time, because of the convention of the American Association of Drilling Contractors.

Rubel will discuss the "Petroleum Situation and War from the Viewpoint of the Pacific Coast." He will present a factual picture of the Pacific Coast situation from the standpoint of producing ability, supply and reserves and post war problems.

The meeting will be held in the Houston Club, with dinner commencing at 6 p.m.

Mid-Continent Association To Discuss Wages

Wages and salaries in the Texas oil industry will be discussed in open forum at the Texas Mid-Continent Oil and Gas Association's 24th annual convention, to be held in Fort Worth, Texas, October 13 and 14, by A. H. Hertwig. Hertwig is head of the regional office of the salary stabilization unit, U. S. Treasury Department, at Dallas, while Floyd McGown is chairman of the eighth regional War Labor Board, Dallas. It is planned to have them conduct an open forum on salaries and wages in the Texas petroleum industry and to answer questions concerning their own particular problems in this connection.

These speakers have agreed to devote most of their time allotted on the program to answering questions concerning the particular labor problems of individual oil operators.

The program committee announced that the program for the 24th annual convention is about completed. Speakers include Eric Johnston, president of the United States Chamber of Commerce, Governor Coke Stevenson, George Sawtelle, president of the association, Wirt Franklin, Deputy Petroleum Administrator for War, John D. Gill, chairman of the committee on cost and price adjustment to the Petroleum Industry War Council, and Hertwig and McGown.

Light and Heavy Fuel Stocks Continue to Gain; All Others Slump Last Week

Production of both light and heavy fuel oils increased last week, resulting in further stock accumulations. Light oil and distillate output was up 29,000 barrels, bringing total stocks to the highest peak so far this year, with 40,328,000 barrels; heavy fuel or residual oils showed a gain of 752,000 barrels, and a total stock reserve of 67,645,000 barrels. Gasoline output declined 530,000 barrels, resulting in stock decline of 1,275,000 barrels and leaving total gasoline stocks at 70,024,000 barrels.

Crude oil production, runs to stills, crude oil stocks, gasoline production and total gasoline stocks declined, while gas-oil and distillate and residual oils showed gains.

These trends indicate the lightest demand during the week was centered on light and heavy types of fuel oil, so that in spite of reduced refinery runs, total quantities of both these products showed gains. Imports of crude oil from South America may be partly responsible for the slight lag in demand for the domestic oil. Also, heavy industry has eased up slightly in its use of oil for power due to scattered conversions to coal-burning equipment. Reviewing the conversion campaign to date, PAW pointed out last week that industrial conversions have resulted in savings equivalent to 176,500 barrels of fuel oil per day. Of this total, 137,155 barrels daily have been saved in the Eastern States, 30,034 barrels daily in the Middle West, and 3,566 barrels daily in the Southwest. As can be seen from these figures, the conversion campaign has been a substantial benefit to the fuel oil supply situation. Conversion has been stopped for the time being due to uncertainties in the coal situation including shortage of delivery equipment and manpower for coal delivery.

Refinery operating capacity was retarded by 1.1 percent as compared with last week, with total runs to stills at 4,156,000 barrels daily average, against 4,209,000 barrels a week ago.

Supplies of gasoline, light and heavy fuel oils for civilian use on the Atlantic Seaboard were 43 percent normal as compared with 42.5 percent a week ago, and 59.6 percent a year ago. This indicates a trying situation for those depending on oil for heat in that section, since requirements were far short of being met last year. However, conversion of oil-burning equipment to coal has been widespread with home owners there this summer also, and the demand for fuel oil will be somewhat reduced this winter.

Also a few new gas transportation facilities have been installed during the summer so that fuel oil will be supplemented by more gas this winter than was available last year.

The crude oil production decline was shared by most districts, with only four districts showing a gain over the previous week. All the major fields stood at the same rate or were slightly lower.

Crude Oil Production in the United States

(Estimates compiled by The Oil Weekly. All figures indicate daily averages, in barrels.)

STATE OR DISTRICT	PRODUCTION IN WEEK ENDED October 2	September 25
Arkansas	76,300	77,350
California	778,350	789,750
Long Beach	31,000	30,750
Midway-Sunset	53,600	54,700
Kettleman Hills	42,450	43,450
Wilmington	92,900	93,300
Rest of State	558,400	567,550
Colorado	7,050	7,500
Illinois	220,600	215,400
Salem	29,200	28,100
Louden	37,500	37,600
Other New Pools	142,950	138,150
Old Pools	10,950	11,550
Indiana	14,400	15,000
Kansas	272,250	296,150
Kentucky	24,650	23,200
Louisiana	360,400	361,250
North	81,500	82,450
South	278,900	278,800
Michigan	56,400	58,550
Mississippi	48,830	48,850
Missouri	95	95
Montana	22,550	22,180
Nebraska	1,700	1,800
New Mexico	109,500	109,500
New York	13,650	14,950
Ohio	8,800	8,950
Oklahoma	325,800	325,250
Oklahoma City	52,500	53,750
Seminole Area	72,950	72,650
Rest of State	200,350	198,850
Pennsylvania	43,500	43,250
Tennessee	30	30
Texas	1,839,200	1,838,900
Upper Gulf Coast	485,600	485,500
East Texas Field	380,500	380,250
Rest of Eastern Texas	131,250	131,350
Lower Gulf Coast	169,300	169,500
Southwest Texas	75,000	75,150
South Central Texas	19,200	19,250
West Texas	333,550	333,350
North Texas	140,700	140,650
Panhandle	104,100	103,900
Utah	30	30
West Virginia	9,250	9,250
Wyoming	102,950	104,400
Total United States	4,336,285	4,371,585

Trends of Operations and Changes in Stocks

Figures on crude stocks are from Bureau of Mines weekly reports; all others from American Petroleum Institute weekly reports, which are estimates on Bureau of Mines basis.

(All figures in thousands of barrels—add 000)

HIGHS AND LOWS OF RECENT YEARS

ITEM	Crude Oil Prod. Barrels Daily	Week Ended	Runs to Stills Barrels Daily	Week Ended	Crude Stocks Barrels	Week Ended	Gasoline Stocks Barrels	Week Ended	Gas Oil & Distillate Stocks Barrels	Week Ended	Residual Fuel Oil Stocks Barrels	Week Ended
Highs:												
1939	3,910	8- 5	3,650	10-21	278,607	5-26	87,769	4-22	39,562	10-28	116,237	8-26
1940	3,890	3-16	3,690	6-22	265,865	8-31	102,817	4-20	49,051	10-19	109,135	9-14
1941	4,337	11-22	[4]4,120	10-18	266,187	3-29	99,727	3-29	[1]54,983	11-15	102,448	1- 4
1942	4,337	2- 7	3,961	1- 3	263,208	3-28	[1]109,281	3-14	49,861	11-14	95,857	1- 3
1943	[4]4,376	9-18	4,227	8-28	245,752	5-29	94,159	3-20	42,913	1- 2	72,881	1- 2
Lows:												
1939	[3]1,601	8-26	3,125	2-18	[2]229,127	10-12	71,152	10- 7	20,722	4-15	105,397	4- 8
1940	3,335	11-30	3,370	1- 6	237,339	1-27	79,847	11- 9	23,551	4- 6	102,344	2-10
1941	3,364	1-11	3,490	1-18	240,399	11-15	79,923	10- 4	28,381	4-12	90,914	7-12
1942	3,297	7- 4	3,393	5-23	231,896	12-12	75,934	12- 5	29,240	4-25	72,962	12-26
1943	3,821	1- 9	3,579	3-13	232,191	1- 9	70,024	9-25	30,732	4- 3	66,448	8-14

TRENDS OF 1942 AND 1943

Trends in Week Ended:	Crude Oil Production Daily	Runs to Stills Daily	Stocks Week End	Gasoline Production Weekly	Stocks Week End	Gas Oil & Distillate Production Weekly	Stocks Week End	Residual Fuel Production Weekly	Stocks Week End
1942:									
January 3	4,038	3,961	244,440	13,797	92,987	3,855	49,357	6,918	95,857
January 31	3,871	3,848	250,740	13,292	97,810	3,817	40,674	6,640	91,189
February 28	4,016	3,675	259,373	12,131	105,635	3,799	34,547	6,813	88,285
March 28	3,820	3,667	263,208	11,663	105,624	3,661	31,756	6,344	83,045
April 25	3,581	3,506	257,073	10,535	102,897	3,267	29,240	6,869	81,107
May 30	3,877	3,522	255,023	10,478	95,355	3,034	31,384	6,993	79,628
June 27	3,719	3,581	253,364	10,713	88,396	3,549	32,851	6,615	77,304
July 25	3,691	3,658	249,262	10,864	82,281	3,647	35,966	6,796	77,816
August 29	3,964	3,697	249,007	11,300	80,831	3,850	42,060	6,875	78,034
September 26	3,909	3,802	242,785	10,954	80,550	.....	45,945	.....	78,943
October 31	3,901	3,731	239,266	11,153	79,159	.....	48,131	.....	79,166
November 28	3,878	3,736	234,850	11,269	78,854	.....	49,739	.....	77,796
1943:									
January 2	3,871	3,734	233,938	10,957	82,420	4,285	42,913	7,683	72,881
January 30	3,826	3,698	233,863	10,339	88,830	3,888	37,057	7,452	70,763
February 27	3,873	3,709	235,217	10,566	93,157	4,230	32,939	7,839	70,140
March 27	3,896	3,742	239,126	10,231	94,079	3,541	30,980	8,018	67,938
April 24	3,913	3,737	242,035	10,583	91,001	3,954	31,142	8,168	67,455
May 29	3,970	4,679	245,752	10,656	83,937	3,798	32,274	7,672	67,682
June 26	3,955	4,015	242,657	11,092	79,589	3,876	34,044	8,126	67,960
July 31	4,133	3,788	238,420	11,127	74,977	3,765	36,363	8,478	66,877
August 28	4,196	4,227	236,170	12,420	72,525	4,351	37,928	8,732	67,250
September 4	4,235	4,214	234,635	12,343	71,402	4,361	38,673	8,703	67,675
September 11	4,354	4,216	234,389	12,606	71,928	4,162	39,401	8,350	67,011
September 18	4,376	4,209	233,681	12,736	71,299	4,420	40,299	8,524	66,893
Sept. 25, 1943	4,344	4,156	.....	12,206	70,024	4,608	40,328	8,560	67,645
Sept. 26, 1942	3,909	3,834	[4]244,294	11,001	78,474	4,215	45,259	7,094	78,943
Change:									
In week	−32	−53	−708	−503	−1,275	+188	+29	+36	+752
In year	+435	+322	−10,613	+1,205	−8,450	+393	−4,931	+1,466	−11,298
In year	+11.1%	+8.4%	−4.3%	+10.9%	−10.8%	+9.3%	−10.9%	+20.5%	−14.3%

[1] All time peak. [2] Lowest since April, 1922. [3] Lowest since October, 1922, due to shutdown of six Mid-Continent States. [4] Stocks, September 19, 1942.

Production's Upward Climb Halted; Big Areas Off

Daily average production of crude for for the week ending October 2, declined from that of the previous week by approximately 35,300 barrels daily, with the drop distributed over most of the major producing districts. Total daily average was 4,336,285 barrels as compared with 4,371,585 barrels a week ago.

Kansas reported the heaviest drop, showing 272,250 barrels daily yield this week against 296,150 barrels last week, a total of 23,900 barrels.

California was down in output, 11,400 barrels this week, showing a daily average of 778,350 barrels. Last week the total was 789,750 barrels.

Illinois production was up 5200 barrels, but this gain was far more than offset by other declines. Small gains were also noted in Kentucky and Montana.

Oklahoma Crude Oil Price Adjustment

Effective October 1, Magnolia Petroleum Company has posted prices for purchased crude oil at the well in Oklahoma as follows: below 21 gravity, 85 cents, with 2-cent differential for each increase of degree in gravity to $1.25 per barrel for 40 and above.

PIPE LINE REVIEW

Texas Governor Plans Tax To Halt Big Gas Line East

Prospects of a special session of the Texas Legislature to increase the tax on natural gas were indicated by Governor Coke Stevenson at a press conference last week. The governor hinted at this program in commenting on the plan for large pipe lines to carry gas from Texas to the East.

The governor said he was studying the possibility of a classified severence tax. This tax might be high enough to make it unprofitable to export the gas.

The opposition to the line has developed recently because of alleged possible damage to industries in Texas, resulting from the exhaustion of reserves of natural gas.

Corpus Christi is seriously concerned about the new line and its representatives called on the governor in Austin last week. They pointed out that the chemical industry developed at the port might be hampered by the program proposed.

Besides the tax phase, the governor said he was trying to determine where proration laws could be amended to restrict production and use. If a classified tax was enacted it might be divided into one rate for domestic use, another for industry, and still a third for exported gas, the governor indicated.

Prior to this time a special session of the legislature has been considered for the purpose of balancing the budget. The gas-tax question, the governor thought, might be injected into this session.

The program outlined by Governor Stevenson follows the suggestion made last week by Dr. E. A. Stephenson, speaking at a meeting of the Inter-State Oil Compact Commission at Santa Fe. Stephenson characterized movement of gas from the Southwest to the East as "outrageous." He recommended that state regulatory bodies do all they could to prevent this plan, and in the event it could not be prevented, he suggested that the severance tax be increased materially.

The line from Corpus Christi to the East has been approved by the Federal Power Commission and the War Production Board. Another line to the Hugoton field on the Oklahoma-Kansas line is contemplated, and hearings on it have been set for October.

Objection to the proposed line was raised by W. N. Blanton, executive vice president of the Houston Chamber of Commerce, who said "any proposal to export this asset to another area, already amply provided with fuel of excellent quality and in huge quantities, is economically absurd, a distinct threat to the future of Texas and unfair in all its implications."

Blanton declared that the Appalachian areas are in immediate proximity of huge coal reserves, and "to take natural gas from Texas to the Tennessee area for use in place of coal simply robs Texas of irreplaceable fuel supplies for the benefit of another area."

The line, which will have a daily capacity of 200,000,000 cubic feet, is to be constructed by the Tennessee Gas and Transmission Company, recently granted a franchise to build the line costing $47,000,000.

"Far from hurting Texas, building the line will open up new markets for surplus gas," asserted Paul Keyser, Houston attorney, and director of the company. None of the fields which the Tennessee company proposes to tap has substantial pipe-line connections, Kayser said, declaring "that many gas fields in Texas are drugs on the market."

He said that present gas reserves of the fields to be tapped are estimated to last for 33 years at the proposed withdrawal rate, not considering new fields that may be developed.

Plans to Get Crude for New Lines to be Worked Out

The crude oil supply sub-committee of the general committee for District 3, met in Houston last week, to formulate plans dealing with physical problems relating to a supply of crude oil for Magnolia Pipe Line Company's proposed line from Midland to Corsicana, and Stanolind Pipe Line Company's line from West Texas to Drumright, Oklahoma. Maston Nixon, of Corpus Christi, Texas, is chairman of the committee.

If Magnolia and Stanolind were required to install facilities extended throughout West Texas to gather the oil necessary to fill their respective lines, large expenditures of critical materials would be necessary and duplication of gathering facilities would occur in many fields. To avoid such improvident use of materials, representatives of crude oil purchasers in the area were invited to the meeting to discuss with the subcommittee each company's ability to contribute to a plan calling for minimum expenditure of material and manpower, and no duplication of gathering facilities.

Midland-Corsicana Pipe Arriving Ahead of Schedule

Delivery of 12 cars of 12-inch pipe for Magnolia Pipe Line Company's 336-mile supplemental Permian Basin outlet from Midland to Corsicana, Texas, was made at Midland early last week. Pipe is arriving ahead of schedule and will enable the contractors to start work as soon as their equipment can be moved in.

Magnolia Pipe Line Company has completed 30 percent of its 46-mile 8-inch looping program between Seminole and Midland that is to substantially boost the transportation facilities for Slaughter and Seminole fields, while the company is currently carrying capacity load of 32,000 barrels daily from the two areas. The increased deliveries into Midland probably will result in the diversion of a portion of this oil to another carrier until the 12-inch to Corsicana is in service.

Building Railroad Loading Rack at Midland

Work is now under way on the construction of a double-track loading rack on the Texas & Pacific near Midland, Texas, to handle an estimated 25,000 barrels daily of Permian Basin crude coming in to the Atlantic Pipe Line Company's terminal and tank farm there. No tank car racks have been available at Midland heretofore. The new installations will have a capacity of 75 cars. From Midland, the oil will travel 1900 miles to the Atlantic Refining Company's Philadelphia refinery.

Buyers Seeking Connections In Permian Basin Area

Pipe lines serving the Permian Basin sector of West Texas and Southeastern New Mexico have stepped up their deliveries to 405,300 barrels daily. Competition for pipe line connections has re-established a "sellers market" in areas having more than one outlet. Buyers are eager to correct minor grievances harboured by producers in anticipation of greater competition that will occur when pipe-line facilities are available to accommodate the Basin's maximum output next spring.

Authorized new lines to Corsicana and Drumright, Oklahoma, will provide an aggregate of 107,000 to 125,000 barrels of additional outlet, depending upon the stations allocated to the former.

McCarthy Buys Shell Building at Houston

Glenn H. McCarthy is the head of a new company, McCarthy Building Company, which has purchased the Shell building at Houston. The consideration for the 22-story structure was given as $2,250,000. The seller was New England Mutual Life Insurance Company of Boston. Shell Oil Company's district offices occupy a large part of this building.

Gravity-Scale Crude Oil Prices in Mid-Continent Fields

Posted in most instances between May 19 and May 21, 1941

GRAVITY	Oklahoma-Kansas: Stanolind, Gulf, Carter, Texas, Skelly, Barnsdall, Tidewater, Sinclair, Phillips, Magnolia	Oklahoma-Kansas: Shell	North Louisiana-Arkansas Mississippi: [1]Rodessa, etc.	North Louisiana-Arkansas Mississippi: [2]Champagnolle, etc. Tinsley, Miss.	North Louisiana-Arkansas Mississippi: Bunkie, Fole, Olla, S. Olla, Little Crk. (by Standard)	North Louisiana-Arkansas Mississippi: Lisbon, La (by Gulf)	North Louisiana-Arkansas Mississippi: [3]Atlanta, Buckner, etc., Ark.	Inland Texas and New Mexico: North and West Central Texas	Inland Texas and New Mexico: [4]Eastern Texas	Inland Texas and New Mexico: Panhandle	Inland Texas and New Mexico: West Texas, New Mexico	South Texas: [5]Refugio Type	South Texas: [6]Mirando Type	Texas Gulf Coast: [7]Gulf Coast	Texas Gulf Coast: [8]Anahuac Type	Texas Gulf Coast: [9]Dickinson Type	Louisiana Gulf Coast: [10]Gulf Coast	Louisiana Gulf Coast: [11]Standard of La.	Louisiana Gulf Coast: [12]Texas Co.	Louisiana Gulf Coast: [13]Texas Co.	Louisiana Gulf Coast: [14]Magnolia Pet. Co.	Louisiana Gulf Coast: [15]Shell Oil Co.	Louisiana Gulf Coast: Jennings (by Gulf)	[16]Rocky Mt. Area (Salt Creek, etc.)
17-17.9	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	$0.94	....	....	....
18-18.9	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	.96	....	....	....
19-19.9	....	....	....	....	....	....	....	....	$0.80	$0.80	$0.70	$1.08	$1.03	$1.06	$0.98	$0.93	$1.06	....	....	....	.98	$0.99	....	....
20-20.9	$0.85	$0.75	....	....	....	....	$0.68	$0.85	.82	.82	.72	1.10	1.05	1.08	1.00	.95	1.08	$0.90	....	....	1.00	1.01	....	....
21-21.9	.87	.78	....	....	....	....	.70	.87	.84	.84	.74	1.12	1.07	1.10	1.02	.97	1.10	.92	....	....	1.02	1.03	....	....
22-22.9	.89	.81	....	....	....	....	.72	.89	.86	.86	.76	1.14	1.09	1.12	1.04	.99	1.12	.94	....	....	1.05	1.05	....	....
23-23.9	.91	.84	....	....	....	....	.74	.91	.88	.88	.78	1.16	1.11	1.14	1.06	1.01	1.14	.96	....	....	1.08	1.07	....	....
24-24.9	.93	.87	$0.88	$0.86	$1.03	....	.76	.93	.90	.90	.80	1.18	1.13	1.16	1.08	1.03	1.16	.98	....	....	1.11	1.09	....	....
25-25.9	.95	.90	.90	.88	1.05	....	.78	.95	{.92 / .97}	.92	.82	1.20	1.15	1.18	1.10	1.05	1.18	1.00	....	....	1.14	1.11	....	....
26-26.9	.97	.93	.92	.90	1.07	....	.80	.97	.99	.94	.84	1.22	1.17	1.20	1.12	1.07	1.20	1.02	....	....	1.17	1.13	....	....
27-27.9	.99	.96	.94	.92	1.09	$0.81	.82	.99	1.01	.96	.86	1.24	1.19	1.22	1.14	1.09	1.22	1.04	....	....	1.19	1.15	....	....
28-28.9	1.01	.99	.96	.94	1.11	.83	.84	1.01	1.03	.98	.88	1.26	1.21	1.24	1.16	1.11	1.24	1.06	$1.06	....	1.21	1.17	....	$0.96
29-29.9	1.03	1.02	.98	.96	1.13	.85	.86	1.03	1.05	1.00	.90	1.28	1.23	1.26	1.18	1.13	1.26	1.08	1.08	....	1.23	1.19	....	.98
30-30.9	1.05	1.05	1.00	.98	1.15	.87	.88	1.05	1.07	1.02	.92	1.30	1.25	1.28	1.20	1.15	1.28	1.10	1.10	$1.05	1.25	1.21	....	1.00
31-31.9	1.07	1.07	1.02	1.00	1.17	.89	.90	1.07	1.09	1.04	.94	1.32	1.27	1.30	1.22	1.17	1.30	1.12	1.12	1.07	1.27	1.23	$1.07	1.02
32-32.9	1.09	1.09	1.04	1.02	1.19	.91	.92	1.09	1.11	1.06	.96	1.34	1.29	1.32	1.24	1.19	1.32	1.14	1.14	1.09	1.29	1.25	1.09	1.04
33-33.9	1.11	1.11	1.06	1.04	1.21	.93	.94	1.11	1.13	1.08	.98	1.36	1.31	1.34	1.26	1.21	1.34	1.16	1.16	1.11	1.31	1.27	1.11	1.06
34-34.9	1.13	1.13	1.08	1.06	1.23	.95	.96	1.13	1.15	1.10	1.00	1.38	1.33	1.36	1.28	1.23	1.36	1.18	1.18	1.13	1.33	1.29	1.13	1.08
35-35.9	1.15	1.15	1.10	1.08	1.25	.97	.98	1.15	1.17	1.12	1.02	1.40	1.35	1.38	1.30	1.25	1.38	1.20	1.20	1.15	....	....	1.15	1.10
36-36.9	1.17	1.17	1.12	1.10	1.27	....	1.00	1.17	1.19	1.14	1.04	1.42	1.37	1.40	1.32	1.27	1.40	1.22	1.22	1.17	....	....	1.17	1.12
37-37.9	1.19	1.19	1.14	1.12	1.29	....	1.02	1.19	1.21	1.16	1.06	1.44	1.39	1.42	1.34	1.29	1.42	1.24	....	1.19	....	....	1.19	1.14
38-38.9	1.21	1.21	1.16	1.14	1.31	....	1.04	1.21	1.23	1.18	1.08	1.46	1.41	1.44	1.36	1.31	1.44	1.26	....	1.21	....	....	1.21	1.16
39-39.9	1.23	1.23	1.18	1.16	1.33	....	1.06	1.23	1.25	1.20	1.10	1.48	1.43	1.46	1.38	1.33	1.46	1.28	....	1.23	....	....	1.23	1.18
40 & Up	1.25	1.25	1.20	1.18	1.35	....	1.08	1.25	1.27	1.22	1.12	1.50	1.45	1.48	1.40	1.35	1.48	1.30	....	1.25	....	....	1.25	1.20

[1] Gulf schedule for Caddo, Homer, Haynesville, Bull Bayou, Crichton, De Soto, El Dorado and Rodessa, Texas. Standard of La. schedule for Cotton Valley, Rodessa, Shreveport (Cross Lake), and Caddo. Magnolia schedule for Haynesville, Cotton Valley, Rodessa, and Miller Co., Ark. Texas Co. schedule for "North Louisiana."

[2] Schedule of Standard of La. for Catahoula Lake, Elm Ridge, Hemphill, De Soto, Sabine, Fouke, Homer, Miller Co., Sugar Creek. Schedule of Root Petroleum Co. for Nick Springs, Urbana light, Schuler sweet, Rainbow, South Field (El Dorado), and Champagnolle.

[3] Schedule of Standard of La. for Atlanta, Buckner, Magnolia, Patton, Schuler: Jones sand, Village. Schedule of Root Petroleum Co. for Schuler: Reynolds lime, and Schuler: Jones sand.

[4] Humble schedule for Anderson, Cherokee, Limestone, and Navarro counties and Navarro Crossing field, except that prices from 80 to 92 cents represent postings only for Hawkins field, Wood County. For Talco crude, Magnolia's prices are same as Humble's for Hawkins. Rodessa, Texas, prices are same as in Rodessa, La.-Ark.

[5] Schedule for Refugio, E. White Point, Greta, Melon Creek, Midway, Minnie Bock, O'Connor-McFaddin, Plymouth, Saxet, Taft, and Tom O'Connor.

[6] Schedule for Blanchard, Bridwell, Colorado, Comitas, Eagle Hill, Escobas, Fitzsimmons, Glen, Government Wells (N. and S.), Heyser, Hoffman, Kelsey, Kohler, Loma Novia, Lundell, Manila, Mirando Valley, Placedo, Randado, Sarnosa, and Tesoro.

[7] Humble schedule for Amelia, Clear Lake, Goose Creek, Hastings, Magnet, Mykawa, Mykawa new, Raccoon Bend, South Thompsons, Sugarland, Thompsons, Webster. Texas Co. schedule for Ariola, Ganado, Hamman, Hillje, Humble, Kubela, Magnet, Manvel, Markham, Mauritz, Old Ocean, Pickett Ridge, Port Neches, Sour Lake, West Columbia, Withers; except that schedule provides $1.36 top, 34 gravity. Pan American Prod. Co. schedule for Hastings and South Houston. Gulf schedule for Spindle Top, Sour Lake, Lovells Lake, West Beaumont, Goose Creek, South Liberty, Big Creek, Blue Ridge, Fannett, Moore, Barbers Hill, Hankamer, Thompsons, Lochridge, Dyersdale, and Hull (old) crudes. Sun schedule for Barbers Hill, Batson old, Cotton Lake, Esperson below 35 gravity, Goose Creek, Greens Lake, Hull below 25, Humble below 35, Nome, North Dayton below 25, Orange, Saratoga, Sour Lake, South Liberty.

[8] Humble schedule for Anahuac, Angleton, Cedar Point, Fishers' Reef, Hull old and new, Pierce Junction, Red Fish Reef, Turtle Bay fields. Sun schedule for Anahuac, Caplen, and Turtle Bay. Gulf schedule for Anahuac, Hull new, Pierce Junction, Orange and Thompsons deep.

[9] Humble schedule for Dickinson, Gillock, Hardin, League City, and Rowan fields. Pan American Prod. Co. schedule for Gillock crude.

[10] Sun Oil Co. schedule for Bayou Blue, Chacahoula, Fausse Pointe, Hackberry (E. and W.), and Vinton. Texas Co. schedule for Bay St. Elaine, Caillou Island, Iberia, Lake Barre, Lake Pelto, Leesville and Port Barre for crude ranging in gravity up to 27-27.9; for lighter oils in those fields see Footnote 12. Gulf schedule for Edgerly, Starks, Vinton, E. Hackberry, Cameron Meadows, Leesville. Deduct 10 cents for Gulf's prices for Timballer Bay, Grand Bay, Quarantine Bay, and West Bay. Deduct 2 cents for Standard of La. prices for University (Baton Rouge) crude of 30 to 35.9 gravity.

[11] Standard of La. schedule for Bayou Mallet, Bayou Sale, Choctaw, Darrow, Jeanerette, Lirette, N. Crowley, S. Crowley, Port Barre, Potash, Roanoke, St. Martinville. Deduct 10 cents for Anse La Butte.

[12] Texas Co. schedule for Bateman Lake, Dog Lake, Fausse Point, Horseshoe Bayou, Jefferson Island, Plumb Bob, Vermilion Bay, West Cote Blanche, and Delta Duck Club. Add 8 cents to these prices for Texas Co. postings for 28 or higher gravity at Bay St. Elaine, Caillou Island, Iberia, Lake Pelto, Leesville, Port Barre, and Lake Barre.

[13] Texas Co. schedule for Delta Farms, Golden Meadows, Lake Salvador. Also Standard of La. for Golden Meadows.

[14] Magnolia schedule for Lockport, Cameron Meadows, West Gueydan.

[15] Shell Oil Co. schedule at Iowa, Black Bayou, White Castle. For Shell's prices at Roanoke and Chalkley fields deduct 5 cents. For Shell's prices at Gibson, South Houma, Hester, and West Lake Verret fields deduct 10 cents.

[16] Sinclair-Wyoming Oil Co. prices at Salt Creek, Lost Soldier, Iron Creek, effective May 20, 1941. Deduct 10 cents for East Mahoney and deduct 20 cents for Mahoney and Werta.

MID-CONTINENT FLAT PRICES

FIELD—	Flat Price	Date Posted
Arkansas:		
Big Crk., Columbia, McKamie, Macedonia, Dorcheat, sour dist.	$1.25	2- 3-43
Dorcheat, Macedonia dist'l.	1.30	11-16-42
Smackover, Heavy	.83	5-22-41
Texarkana sweet distillate	1.40	-42
Louisiana, North:		
Cotton Valley Distillate	1.40	9- 1-41
Cotton Valley (Holloway sn.)	1.25	5-22-41
Lisbon Distillate	1.20	5-22-41
Urania	1.15	5-22-42
Louisiana, South:		
Erath	1.21	5-21-41
Garden Island	1.36	5-21-41
Happytown	1.15	5-20-41
Lafitte, Paradis	1.19	5-21-41
Lake Arthur & Tepetate	1.18	5-21-41
Lake Mongoulois	1.36	5-21-41
Ville Platte	1.30	5-22-43
Nebraska:		
Falls City, in field	.90	8- 1-41
Falls City, in tank cars	.95	8- 1-41
Shubert, in tank cars	.97	8- 1-41
Texas:		
Alice, Benavides (No. Sweden), Ben Bolt, Clark-Muil, Sun and Tom Graham	1.35	5-21-41
Cayuga	.90	5-21-41
Chapel Hill 50° and up	1.25	3-19-42
Chapel Hill below 50°	1.18	1-20-42
Clay Creek	1.00	5-22-41
Cleveland	1.26	5-21-41
Conroe	1.43	5-21-41
Esperson 35° & up; S. Esperson (Sun Oil)	1.30	5-22-41
East Texas, Flag Lake	1.25	5-20-41
Flour Bluff, East Flour Bluff, and La Rosa	1.33	5-21-41
Hockley-Cochran Counties	.87	5-21-41
Livingston, Cleveland	1.25	5-20-41
Long Lake	1.23	5-21-41
Luling	1.05	5-21-41
Lytton Springs	1.17	5-21-41
North Rincon	1.45	2- 3-43
Salt Flat, North Salt Flat, Darst Creek, Hilbig, Carroll, Clark, Zoboroski	1.14	5-21-41
Satsuma, Tomball	1.40	5-21-41
Sun Oil Co. at Batson (new), Fig Ridge, Hardin, Hull 25 and up, Humble 35 and up, LaBelle, N. Dayton 25 and up, Oyster Bayou, Seabreeze, S. China, W. Orange and Willow Slough	1.25	5-22-41
South Cotton Lake	1.35	5-22-41
Sun, N. Sun, N. Rincon, Garcia	1.35	5-22-41
Van	1.08	5-21-41
Yates (Deep)	.95	5-20-41
Yates (Shallow)	.82	5-20-41
Yturria (Sun in S. Texas)	....	....

MICHIGAN PRICES

Central (Basin):		
Porter, Greendale, Crystal, Wise, Midland, Vernon, Saginaw	$1.44	5-27-41
Buckeye, Edenville, Bentley, Beaverton, Monitor, Kawkawlin	1.42	5-27-41
Freeman, Lincoln, Sherman Redding, Temple, Winterfield, Trenton Monroe Co., Fork Tws.-Mecosta Co.	1.39	5-27-41
Hamilton-Grout	1.29	5-27-41
Adams	1.27	6- 1-41
Arenac, Clayton, Ogemaw, W. Branch	1.24	5-27-41
Southwest (Shallow):		
Traverse, crude in Allegan, Kent, Ottawa, Van Buren Counties	1.45	6- 2-41
Clare	1.11	5-27-41

MIDDLE WEST PRICES

FIELD—	Flat Price	Date Posted
Lima, Ohio-Ind.	$1.50†	10-28-42
Illinois Basin (Sohio Corp.)	1.37	5-19-41
Lake Centralia-Salem, Illinois	1.37	5-19-41
Eastern Ill.-Western Ind.	1.22	5-21-41
Plymouth, Illinois	1.05	4-28-43
Western Kentucky	1.37	8- 9-43
Birk City, Western Kentucky	1.37	8- 9-43
Kentucky River; Eastern Ky.	1.43	6-19-41
Big Sandy River, Eastern Ky.	1.43	8- 9-43
Cleveland, Lodi, Chatham, Ohio	1.30	9- 1-41

ROCKY MOUNTAIN STATES PRICES

Colorado:		
Canon City and Florence	$1.05	5-21-41
Iles	1.07	5-20-41
Montana:		
Cat Creek	1.15	4- 1-41
Cut Bank (6 Buyers)*	1.05-1.20	3-30-42
Dry Creek	1.02	5-20-41
Sunburst	1.00	5-20-41
New Mexico:		
Artesia	.94	5-21-41
Hogback	1.00	10-11-38
Wyoming:		
Big Muddy	1.08	5-30-41
Byron	.70	3- 4-43
Elk Basin	1.00	5-21-41
Elk Basin, Black	.90	4-28-43
Frannie, Light	.85	2-26-43
Frannie, Heavy	.62	2-26-43
Garland	.60	3- 4-43
Grass Creek, Light	1.00	5- 1-41
Grass Creek, Heavy	.65	4- 1-43
Hamilton Dome	.60	2-26-43
Lance Creek (Ohio Oil Co.)	1.12	7- 1-41
Mill Creek	.72	10-11-38
Oregon Basin	.65	3- 4-43
Osage	1.30	10-11-38
Poison Spider	.65	2-26-43
Rock River	1.15	5-21-41
Salt Creek, Tensleep Heavy	0.8285	2-27-43

*About 25% of Cut Bank crude brings $1.20 per barrel; 65% less than $1.20 and minimum $1.10; and 10% less than $1.10.

†$1.50-price applies to about ¾ of field's production; $1.60 to ¼ of it.

Wholesale Prices of Refined Products in Principal Markets

REFINED GASOLINE	Current Range (Cents a gal.)		Changes from Month Ago	
Oklahoma Refineries:				
60 Octane and Under	5⅛	5¼	...	...
63-66 Octane	5⅝	5⅝	...	...
72-74 Octane	6	6	...	...
78 Octane, Ethyl	6¾	6⅞	...	...
Mid-Western Tank Car:				
60 Octane and Under	5⅛	5¼	...	...
63-66 Octane	5⅝	5⅝	...	...
72-74 Octane	6	6	...	...
78 Octane, Ethyl	6¾	7¼	...	+⅛
New York Harbor:				
68-70 Octane	9¼	9¼	...	...
72-74 Octane	9¼	9⅜	...	...
Gulf Coast, Cargoes:				
60 Octane unleaded	5	5	...	...
65 Octane unleaded	5¼	5¼	...	...
68 Octane unleaded	5½	5⅝	...	...
70 Octane unleaded	5⅝	5⅝	...	...
63-65 Octane leaded	...	...	...	...
72-74 Octane leaded	5⅜	5⅜	...	...
Min. 80 Octane leaded	6¼	6¾	...	...
NATURAL GASOLINE				
Grade 26-70:				
F.O.B. Group 3	4¼	4¼	+⅛	+⅛
F.O.B. Br'kenr'ge, Tex.	3⅞	3⅞	+⅛	+⅛
KEROSENE				
Oklahoma Refineries:				
41-43 water white	4⅜	4⅜	...	—⅛
42-44 water white	4½	4½	...	...
Mid-Western Tank Car:				
41-43 water white	4⅜	4⅜	...	...
42-44 water white	4½	4½	...	...
New York Harbor	7⅛	7⅛	...	...
†Gulf Coast:				
41-43 water white	4⅛	4⅛	...	...
42-44 water white	4⅛	4⅛	...	...
RANGE OIL				
At Oklahoma Refineries	4	4⅛	—⅛	—⅜
In Mid-Western Market Group 3, basis	4	4⅛	...	...
LIGHT FUEL OILS				
Oklahoma Refineries:				
No. 1 prime white	3⅞	3⅞	...	...
No. 1 straw	...	...	...	...
No. 2 straw	3⅝	3⅞	...	+⅛
No. 3	3½	3½	...	...
Mid-Western Tank Car:				
No. 1 prime white	3⅞	3⅞	...	...
No. 2 straw	3⅝	3⅝	...	...
No. 3	3½	3½	...	...
New York Harbor:				
No. 1	7⅛	7⅛	...	...
No. 2	6¾	6¾	...	...
No. 3	6¾	6¾	...	...
Gulf Coast Cargoes:				
No. 2	3¾	3¾	...	...
DIESEL & GAS OILS (Cents per gallon, cargoes, according to Diesel index number)				
Gulf Coast:				
Below 43 diesel index	...	...	...	...
43-47 diesel index	4	4	...	...
48-52 diesel index	4	4	...	...
53-57 diesel index	4⅛	4⅛	+⅛	...
58 and above	4¼	4¼	...	...

HEAVY FUELS	Current Range (Per Bbl.)		Changes from Month Ago	
Oklahoma Refineries:				
No. 6	...	...	...	...
14-16 Gravity	$0.97	$0.97	...	...
Mid-Western Tank Car:				
No. 5	.85	.85	...	...
No. 6	.80	.80	...	...
New York Harbor:				
No. 5	1.95	2.01	...	...
No. 6	1.65	2.07	...	...
BUNKER C FUEL OIL (Per barrel, ships' bunkers)				
Gulf Coast	$0.85	$1.27	...	...
New York Harbor	1.65	2.07	...	...
DIESEL OIL, HEAVY (Per barrel, ships' bunkers)				
Gulf Coast, below 28 grav.	$1.35	$1.35	...	...
Gulf Coast 28 grav.	1.65	1.65	...	...
New York Harbor	2.78	2.78	...	...
LUBRICATING OIL (Cents a gallon)				
Oklahoma Refineries:				
Bright stock (viscosity at 210°):				
200 vis. D, 10-25 pour point	27	27	...	...
150-160 vis. D:				
0-10 pour point	23	23	...	...
10-25 pour point	22½	23	...	...
25-40 pour point	23	23	...	...
150-160 vis. E	22	22	...	...
120 vis. D, 0-10 pour point	22	23	...	...
Cylinder Stocks:				
600 s.r. dark green	8½	8½	...	...
600 s.r. olive green	10	11	...	...
631 s.r.	18½	18½	...	...
Neutral Oils (viscosity at 100°, 0-10 pour point):				
Pale Oils:				
60- 85 vis. No. 2 color	8	8	...	...
86-110 vis. No. 2 color	8½	8½	...	...
150 vis. No. 3 color	14½	14½	...	...
180 vis. No. 3 color	15	15	...	...
200 vis. No. 3 color	15	15	...	...
250 vis. No. 3 color	16	16½	...	...
280 vis. No. 3 color	17	17	...	...
300 vis. No. 3 color	18	18	...	...
Red Oils:				
180 vis. No. 5 color	15	15	...	...
200 vis. No. 5 color	15	15	...	...
280 vis. No. 5 color	...	...	...	...
300 vis. No. 5 color	17½	17½	...	...

LUBRICATING OIL (Cents a gal.)			Changes from Month Ago	
Western Pennsylvania:				
Cylinder Stocks:				
600 s.r. filtrable	15	15	...	...
650 s.r.	15½	15½	...	...
600 flash	16	16	...	...
630 flash	17	17	...	...
Bright Stock (No. 8 Color, 145-155 vis. at 210°, 540-550 fl.):				
10 pour test	30½	30½	...	...
15 pour test	29½	29½	...	...
25 pour test	25	25	...	...
Viscous Neutrals (No. 3 Color, vis. at 70°):				
200 vis. (180 at 100), 420-425 fl.:				
Zero pour test	31½	31½	...	...
10 pour test	30½	30½	...	...
15 pour test	29½	29½	...	...
25 pour test	25	28	...	...
150 vis. (143 at 100), 400-405 fl.:				
Zero pour test	29½	29½	...	...
10 pour test	28½	28½	...	...
15 pour test	27½	27½	...	...
25 pour test	23	26	...	...

EASTERN STATES CRUDE OIL PRICES

FIELD—	Flat Price	Date Posted
Bradford-Allegany	$3.00	3-26-42
Sw. Pa. Pipe Line	2.65	3-26-42
Eureka Pipe Line, W. Va.	2.59	3-26-42
Corning Grade, Ohio	1.31	5-27-41
Buckeye Crude, Ohio	2.30	6-18-41

MAJOR CRUDE OIL PRICE CHANGES

	Penna. Grade	Mid-Cont. (36 Gr.)	Calif. (26 Gr.)
May 22, 1940	Cut 25	.....	.....
June 18, 1940	Cut 25	.....	.....
July 12, 1940	Cut 25	.....	.....
Aug. 28, 1940	Cut 15	.....	.....
Nov. 12, 1940	Up 15	.....	.....
Dec. 17, 1940	Up 15	.....	.....
Jan. 27, 1941	Up 15	.....	.....
April 1, 1941	.....	Up 5	.....
April 23, 1941	Up 10	.....	.....
May 19, 1941	.....	Up 10	.....
May 21, 1941	Up 15	.....	.....
June 18, 1941	Up 20	.....	.....
Aug. 14, 1941	Up 23	.....	.....
Aug. 25, 1941	Cut 23	.....	.....
March 26, 1942	Up 25	.....	.....
April 1, 1943	.....	.....	Up 125

‡ 14 and 15 gravity.

CRUDE OIL PRICES IN CALIFORNIA

Prices per barrel in field, posted by Standard Oil Company of California, effective May 25, 1943.
All gravities above those quoted take highest price offered in that field.

GRAVITY	Signal Hill (Long Beach)	Wilmington	El Segundo	Seal Beach	Huntington Beach	Inglewood	Olinda, Brea Canon	Athens-Rosecrans	Torrance	Richfield	Whittier, East Coyote (La Habra)	Montebello	West Coyote Hills	Santa Fe Springs	Newhall, Kern River, Kern Front, McKittrick, Round Mountain	Greeley, Canal, Wasco	Coles Levee	Mountain View	Elk Hills, Buena Vista Hills, Midway-Sunset, Lakeview Area	Lost Hills	Coalinga	Wheeler Ridge	Kettleman Hills	Elwood Terrace
12-12.9	....	....	....	....	....	....	....	....	....	....	....	....	....	....	$0.94	....	....	....	$0.94	$0.94	$0.94	....	....	....
13-13.9	....	....	....	....	....	....	....	....	....	....	....	....	....	....	.96	....	....	....	.96	.96	.96	....	....	....
14-14.9	....	$0.93	....	....	$0.96	....	$0.95	....	$0.95	$0.95	$0.95	$0.97	....	....	.98	....	....	....	.98	.98	.98	....	....	....
15-15.9	....	.93	....	....	1.00	$1.01	.97	....	.97	.96	.97	.97	....	....	*Playa	....	....	....	.98	.98	.98	....	....	....
16-16.9	....	.96	$1.01	....	1.00	1.01	.97	....	.97	.96	.97	.97	....	....	del	....	....	....	.98	.98	.98	....	....	....
17-17.9	....	.96	1.01	....	1.00	1.01	.97	....	.97	.96	.97	.97	....	....	Rey	....	....	....	.98	.98	.98	....	....	....
18-18.9	$0.93	.96	1.01	....	1.00	1.01	.97	....	.97	.96	.97	.97	....	....	.88	....	....	....	.98	.98	.98	....	....	....
19-19.9	.93	.96	1.01	....	1.00	1.01	.97	....	.97	.96	.97	.97	....	....	.88	....	....	$0.98	.98	.98	.98	....	....	....
20-20.9	.93	.96	1.01	....	1.00	1.01	.97	....	.97	.96	.97	.97	....	....	.88	....	....	.98	.98	.98	.98	....	....	....
21-21.9	.93	.96	1.01	....	1.00	1.01	.97	....	.97	.96	.97	.97	....	....	.88	....	....	.98	.98	.98	.98	....	....	....
22-22.9	.96	.98	1.02	$0.88	1.00	1.01	.97	....	.97	.96	.97	.97	....	....	.88	....	....	.98	.98	.98	.98	$0.95	....	....
23-23.9	1.00	1.02	1.05	.92	1.02	1.01	.98	....	.97	.98	1.00	.97	....	....	.91	....	....	.98	.99	.98	.98	.95	....	....
24-24.9	1.03	1.06	1.07	.97	1.05	1.04	1.01	....	1.01	1.02	1.03	.97	$0.99	....	.95	....	....	.98	1.03	.99	.98	.95	....	....
25-25.9	1.07	1.09	1.10	1.01	1.08	1.07	1.04	....	1.05	1.06	1.07	.98	1.02	....	.99	....	....	.98	1.07	1.01	.98	....	....	....
26-26.9	1.11	1.12	1.12	1.06	1.11	1.10	1.08	....	1.09	1.10	1.11	1.01	1.06	....	1.03	....	....	.98	1.11	1.04	.98	....	....	....
27-27.9	1.15	1.15	1.15	1.10	1.14	1.14	1.11	....	1.13	....	1.15	1.05	1.10	$1.04	....	....	....	1.01	1.15	1.07	.98	....	....	....
28-28.9	1.18	1.18	1.17	1.15	1.17	1.17	1.14	....	1.17	....	....	1.08	1.13	1.08	....	....	....	1.04	1.19	1.10	1.00	....	....	....
29-29.9	1.20	1.21	....	1.19	1.20	1.20	....	$1.17	....	....	....	1.12	1.17	1.12	....	....	....	1.07	1.24	1.13	1.02	....	....	....
30-30.9	1.23	1.24	....	....	1.23	1.22	....	1.21	....	....	....	1.15	1.21	1.15	....	$1.01	$1.09	1.10	1.28	1.16	1.04	....	....	FOB
31-31.9	....	....	....	....	....	1.24	....	1.25	....	....	....	1.19	1.24	1.19	....	1.04	1.12	1.14	....	....	1.06	....	....	Ship
32-32.9	....	....	....	....	....	....	....	1.29	....	....	....	1.23	1.28	1.23	....	1.07	1.14	1.17	....	....	1.09	....	....	....
33-33.9	....	....	....	....	....	....	....	1.32	....	....	....	1.27	....	1.26	....	1.10	1.17	....	....	....	1.11	....	....	$1.22
34-34.9	....	....	....	....	....	....	....	1.36	....	....	....	1.31	....	1.30	....	1.13	1.20	....	....	....	1.13	....	....	1.25
35-35.9	....	....	....	....	....	....	....	....	....	....	....	1.35	....	....	....	1.16	1.22	....	....	....	....	....	$1.23	1.28
36-36.9	....	....	....	....	....	....	....	....	....	....	....	1.39	....	....	....	1.19	1.25	....	....	....	....	....	1.26	....
37-37.9	....	....	....	....	....	....	....	....	....	....	....	1.43	....	....	....	1.22	....	....	....	....	....	...	1.29	....
38-38.9	....	....	....	....	....	....	....	....	....	....	....	1.47	....	....	....	1.25	....	....	....	....	....	....	....	....
39-39.9	....	....	....	....	....	....	....	....	....	....	....	1.51	....	....	....	....	....	....	....	....	....	....	....	....
40-40.9	....	....	....	....	....	....	....	....	....	....	....	1.53	....	....	....	....	....	....	....	....	....	....	....	....

* Effective April 1, 1943, posted by Union Oil Company of California.

International Developments

Peace River Gas Output Estimated 35 Million Feet

Gas wells of the Peace River district near Pouce Coupe are capable of a flow of 35,000,000 feet a day according to reports reaching Vancouver, B. C.

The Alaska Highway Oil & Gas Company (formerly Bonanza Royalties) well shot flames 30 feet in the air. Its flow of 5,000,000 cubic feet a day from 2168 feet will be used as fuel in further drilling. It is east of Rolla, British Columbia, and in the same field where Imperial Oil drilled a well in 1919.

The Imperial well flow is calculated at 10,000,000 feet a day and that of the old Guardian well at 20,000,000 feet.

The Alaska Highway Gas & Oil Company, recently formed by L. R. Champion, Montreal financier, has taken over Bonanza 1 and the Guardian well, and has formed Oil Sands, Ltd., to operate International Bitumen Company.

Independent Company Starts Tests in Taber Area

Mid-Continnet Oil and Gas, Ltd., with the largest acreage of any independent oil company in the Taber Oil area of Southern Alberta, has let contracts to drill its first two wells immediately.

Holdings of Mid-Continent, in the middle of the properties of major oil companies, include leases of 1560 acres lying just to the west of leases on which Dominion Oil Company (Standard of California) Nos. 1, 2 and 3 wells are located. In addition, the company holds a half interest in two reservations covering some 60,000 acres.

Vermilion Field in Western Canada Gains in Output

With more than 30 wells now producing in the Vermilion field, Western Canada, and a number of others drilling, it is hoped that the area will have 50 producers by the end of this season. So far this year, Franco Oils refinery has shipped 42,000 barrels of crude for railway use, from the district. With the increase in drilling, the schedule has been advanced to 15,000 barrels per month.

Extreme weather conditions will cause curtailment of field activities beginning about the first of January, next year.

Clarence O. Brown, president of Vermilion Consolidated Oils, the principal operator in the Vermilion district, reports that approximately 60,000 acres of land in the area are under lease. Of this amount, only 3000 acres have been tested for oil and about 5000 for gas.

Vermilion wells have so far been low-cost producers from shallow depths, with all the wells being pumpers. The field is believed to have potential production possibilities in the Devonian, below 2500 feet. Attention is steadily being shifted toward Western Canada as a source of future oil.

Alberta Oil Output Drops in Six Months

"For the first time in Alberta's oil history, it becomes necessary to report a decline in the production of this product," writes J. L. Irwin, statistician of the Alberta Department of Lands and Mines, in a half yearly review.

The half-yearly production was 4,867,-491 barrels, compared with 5,144,482 in the same period of last year, a reduction of 276,991 barrels.

"The reason for the decline is due partly to the fact that production from a second major field has not yet been introduced into the province," Irwin said. "The principal reason, however, is that drilling programs, within the proven zone of Turner Valley, were reduced by the end of June to half the number that were in operation at the beginning of the year."

American Oil Holdings In Western Canada Large

Several American oil companies have, through Canadian subsidiaries, acquired large holdings in the Taber area, which now has four wells in production. McColl-Frontenac (The Texas Company) has approximately 600,000 acres; Imperial Oil (Standard of New Jersey), close to 500,000 acres; Dominion Oil (Standard of California) with over 750,-000 acres, and Shell Oil has taken over extensive acreage at the southern end of the block.

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View Western Canada As Vast Oil Reserve

Western Canada looms as a major source of oil urgently needed to meet growing United Nations' requirements for war purposes and also for the heavy peacetime needs which are anticipated after victory.

This oil is expected to come from the Province of Alberta, which offers, both geographically and geologically, the major production possibilities. Alberta is approximately the same size as Texas and most of it offers chances for the discovery of major oil fields, but development work thus far has been meagre in proportion to its area. There are less than 300 producing wells in the province, compared with about 100,000 in Texas.

A major exploration program has been launched, however, on a scale never before witnessed in the province, with a number of American oil companies participating which have never been in this field before.

The incentive to develop Alberta's oil has been enhanced by the opening of the Alaska Highway, which has moved the frontier of North American civilization from Edmonton 1200 miles northward to Fairbanks, Alaska, and which is expected to bring a steady increase in population, industry and petroleum requirements in this vast area.

Furthermore, once Alberta's oil production has been developed sufficiently, plans will be considered to move the oil in quantity by pipe line to the Great Lakes and then by tanker to Eastern Canada. It also may be shipped westward to the Pacific coast for export.

The development of a major oil production in Canada is urgent and Alberta offers favorable geological conditions over a wide area strategically located for exploration and development. A limestone belt flanks the Rock Mountains in Western Alberta, known as the "foothills" belt, while eastward lies an open plain reaching well into Saskatchewan, which contains sandstones of geological age productive of oil in the Rocky Mountain and Mid-Continent fields of the United States, and in which oil indications have been found at shallow depths in wells drilled at widely scattered points.

Working Over Old Well In Vermilion Area

Vermilata Oils, Ltd., announces that in conjunction with Pacalta Oils, Ltd., and South End Petroleums, it has commenced reconditioning Vermilion Consolidated 3, a well 12 miles north of the producing area in the Vermilion field.

This well was drilled five years ago and then was considered one of the best in the field. Water trouble developed, however, and it has been left standing. The present work is to try and correct the trouble and place it on a producing basis. If this effort is successful it may open up a whole new producing area in which the above mentioned companies have secured a substantial acreage. Work was commenced September 20 under supervision of P. D. Bowlen, formerly president of Texas-Canadian Oil Company.

Fort Norman Output Is Not Yet at Peak

Some question has been raised that the production from the Fort Norman oil field for the first half of this year, while showing a large increase over the two previous years, seems hardly commensurate with the amount of money being spent for the pipe line facilities, etc., estimated in the neighborhood of $10,000,000.

It has been pointed out, however, that the production was for the first six months of this year, and up to that time the pipe line had not been completed, so that production from the wells was limited to the amount which could be used in the immediate neighborhood of the field and kept in storage awaiting completion of the line.

Production in Peru On Increase This Year

Petroleum production in Peru for the first 6 months of the current year is estimated at 7,816,160 barrels, indicating that an increase of 1,000,000 barrels can be expected in 1943. Production totaled 14,632,530 barrels in 1942, an increase of 173,219 barrels over 1941. Included in the 1942 figure were 13,628,558 barrels of crude oil and 1,003,972 barrels of natural gasoline.

Two wells are being drilled in a zone in the Pirin region, Department of Punto, adjacent to a section previously exploited, and preliminary geological prospecting is also under way in neighboring zones which may contain petroleum.

U. S. Field Operations

Illinois

Effingham County Has New Field, New Horizon

Effingham County with a proven pool opener and discovery of a new horizon in an old producing area was one of the brightest spots in the Illinois basin this week.

C. E. Stout and associates' Bushue 1, SW NW 16-6n-6e, 4½ miles east of the Mason pool, opened a new area with production from McClosky lime. Perforated with 16 shots at 2564-68 feet and 8 shots at 2570-72 feet, the well swabbed 6 barrels of oil per hour and after a light acid treatment increased to 11 barrels per hour. The well is being placed on pump for additional testing.

In the South Mason pool, Kingwood Oil Company has added a new horizon, the McClosky lime, at Byers 1, SW SW NW 35-6n-5e. The well pumped 220 barrels of oil in 24 hours from the McClosky lime at 2441-45 feet. There was a slight show of water. Other production in the pool is from shallow sand.

White County: Smokey Oil Company's Delap 1, SE SW NE 8-7s-8e, is indicating a small pool opener in the McClosky. A drill-stem test of lime at 3075-86 feet yielded 105 feet of oil and 60 feet of oil-cut mud. Casing was set to test at 3080-83 feet with total depth at 3086 feet.

Gulf Refining Company's Connery 1, SE SE NW 1-5s-8e, which had the appearance of a pool opener during a drill-stem test, may prove a dry hole. After perforations at 3305-18 feet in McClosky lime and acid treatment of 2000 gallons, the hole filled 2000 feet with water. The operator is fishing for swab lost in the hole.

Skelly Oil Company's Ramming 1, SW SE NE 24-5s-10e, has better prospects of making a small pool opener. The well showed oil and water when McClosky was perforated at 3092-97 feet. No increase in oil or water was noted when additional perforations were made at 3007-14 feet. Testing continues.

Edwards County: First National Petroleum Trust's Brown 1, S½ SW SW 6-2s-11e, is a pool opener in Edwards County from Aux Vases sand. With additional sand to be drilled and tested, the well swabbed and flowed 143 barrels of oil in 12 hours after a 20-quart shot at 3012-20 feet.

Shelby County: Aylward Petroleum Company has set casing for a test of Aux Vases sand at Moran 1, NE NE NW 27-10n-5e, for an extension attempt of the Stewardson two-well pool. Casing was set to 1934 feet and is expected to make a small well. F. F. Yakey and associates have staked location for Scheef Heirs 1, SE SE SW 22-10n-5e, for a northwest extension attempt.

Hamilton County: National Associated Petroleum Company in a recent test of its pool-opening York Tibbs 1, NE NE NW 35-4s-7e, gauged the well at 70 barrels of oil by flow in 2 hours. The well was then shut in.

Clay County: Superior Oil Company is testing Hinterscher 1, NE SE NW 11-4n-8e, for a pool opener a mile northeast of the old Ingraham field which had one well, which was abandoned. The Hinterscher 1, swabbed 50 barrels of oil in 8 hours from McClosky lime at 3068 feet after acid treatment of 1000 gallons. Total depth is 3075 feet.

Indiana

Lake County Wildcat Location Is Wide Step-Out

A wildcat, staked in Lake County 70 miles southeast of Chicago, was the most interesting oil development in Indiana this week. The well is Peter Fox & Sons' Carstan 1, NE NE NE 5-32n-9w and is scheduled for a 2500-foot test. Peter Fox & Sons is a brewery corporation.

Operations in Indiana remained at 71 for the second consecutive week. The operations included 38 wells drilling, 19 locations, four wells rigging tools, and 10 inactive tests. First reports dropped from 5 to 4. Wildcat operations moved up from 26 to 29, including 12 wells drilling, 11 locations, 2 wells rigging tools and 4 inactive tests. First reports totaled 3.

Three producing wells were completed in the state with total initial production of 124 barrels of oil daily. No dry holes were recorded.

Kentucky

St. Vincent Pool Extended; Drilling Shows Increase

A slight northern extension of the St. Vincent pool and an increase in operations were the highlights of oil activity in Kentucky this week.

Sun Oil Company extended the St. Vincent pool of Union County north with Tapp 3, 10-O-20, which flowed 497 barrels of oil in 24 hours, from McClosky lime at 2502-10 feet. The company has Tapp 4 drilling near the pay zone.

Operations in the state jumped from 75 to 80 this week and included 67 wells drilling, 6 locations, 3 wells rigging tools and 4 inactive tests. First reports totaled 15 as compared with 3 during the previous week. Wildcat tests totaled 30, of which 25 were drilling. Three were locations, 1 was rigging tools and 1 was inactive. First reports totaled 6. Two oil-producing wells were completed for total initial production of 454 barrels. Nine dry holes were recorded.

Henderson County: Sun Oil Company has staked an interesting wildcat location midway between St. Vincent and Poole pools. It is Duncan 1, 18-O-22, drilling below 1966 feet after recovering 3 feet of oil on a brief drill-stem test of Pennsylvania sand at 1035-50 feet. Tar Springs sand was topped at 1875 feet.

One mile east of the Robards pool, Sohio Producing Company is drilling below 2651 feet at Royster 1, 25-O-24. It topped Cypress sand at 2262 feet but found no shows. Production in the Robards pool is in Bethel.

Oklahoma

Wildcat Draws Attention to Remote Western District

A wildcat far off the beaten path is showing slight saturation, again drawing interest to the western part of the state where the Anadarko Basin offers possibilities in a number of strata. The well is Northern Ordnance, Incorporated, and Carter Oil Company's Bradshaw 1, CSE SE 28-22-17w, Woodward County, in northwestern Oklahoma. The location is in an area having no production except a gas well drilled by Sinclair Prairie Oil Company years ago, 60 miles northwest. Bradshaw 1 cored Hunton lime between 9326 and 9336 feet and recovered some saturation. The section was to be given a drill-stem test before going deeper.

Payne County: Skelly Oil Company's Simpson 1, SWC SE 30-19-5e, found the Second Wilcox sand tight in the upper part of the stratum and before it softened sufficiently to have a chance of producing, the hole had deepened into water. Total depth is 4986 feet from which the well will plug back to the Misener sand where it will complete as a gas well.

Oklahoma County: Stanolind Oil & Gas Company's Johnson 1, NW SW NE 9-13-1e, was deepened from the First Wilcox sand to the second bench and is running casing to 5885 feet to test the sand after an electric log gave a kick in the formation. While the formation was being drilled returns did not appear favorable.

Washita County: Gulf Oil Corporation's Hopkins 1, C NW SE 8-8n-20w, a deep wildcat, is temporarily shut down with engine trouble at 8739 feet, still in Pennsylvanian sands and shales.

Noble County: Sinclair Prairie Oil Company's Bradbury 1, NE SE NW 29-22-1w, is coring saturation in the Second Wilcox sand. The hole is below 5080 feet and is deepening slowly. Cores were considered fairly good but no test has been made. Location of the well is in the first township north of the Perry district.

Kansas

Off-Trend Activity Drawing Most Attention Currently

More interest is evidenced in off-trend locations this week than in wildcat progress in established areas. Of the 86 tests now under way, nearly 45 percent are in off-trend sections where subsurface data is indefinite. Most of the wells are drilling in upper formations; consequently there are no indications of importance from the areas.

Graham County: One of the off-trend completions which drilled a full section without showing important saturation is Mid-Continent Petroleum Corporation's Hazen 1, CSE SE 18-8-25w, which was completed in the Arbuckle at 4447 feet after topping the lime at 4444 feet. The test found the top of anhydrite at 2098 feet, Topeka at 3313 feet, Lansing at 3687 feet, Mississippi at 4232 feet,

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Viola at 4330 and Simpson at 4435 feet. While shows were encountered, they were non-commercial.

Norton County: A near completion is R. W. Shields et al's Hicks 1, CSW NE 2-3s-25w, which has water at 3833 feet. However, the test is on the probable extension of the Uplift feature and is noted for a show of oil encountered in the Reagan sand, at 3756 feet, and in the Topeka at 3474-3479 feet. In the same vicinity, but across the state line in Nebraska, an abandoned test has been plugged at 3840 feet in the Arbuckle after getting a full section without encouraging shows. The test is Bell Oil & Gas Company's Flamming 1, CSE NE 25-2-20w, also on the probable continuation of the Uplift feature. The well has Topeka at 3120 feet, Lansing at 3337 feet, Simpson at 3725 feet and Arbuckle lime at 3773 feet. Fort Hays and Dakota sands were topped at 625 and 960 feet respectively.

Logan County: The Texas Company has staked location for an off-trend wildcat in Smith 1, NEC SW 30-11-36w, which is 100 miles from any production or development of consequence. In the first county north, the same operator has another well in shallow formation.

McPherson County: Morton and Adair et al's Paden 1, CSW SE 10-18-1w, wildcat, is showing some oil in Mississippi chat topped at 2769 feet. The hole is being deepened.

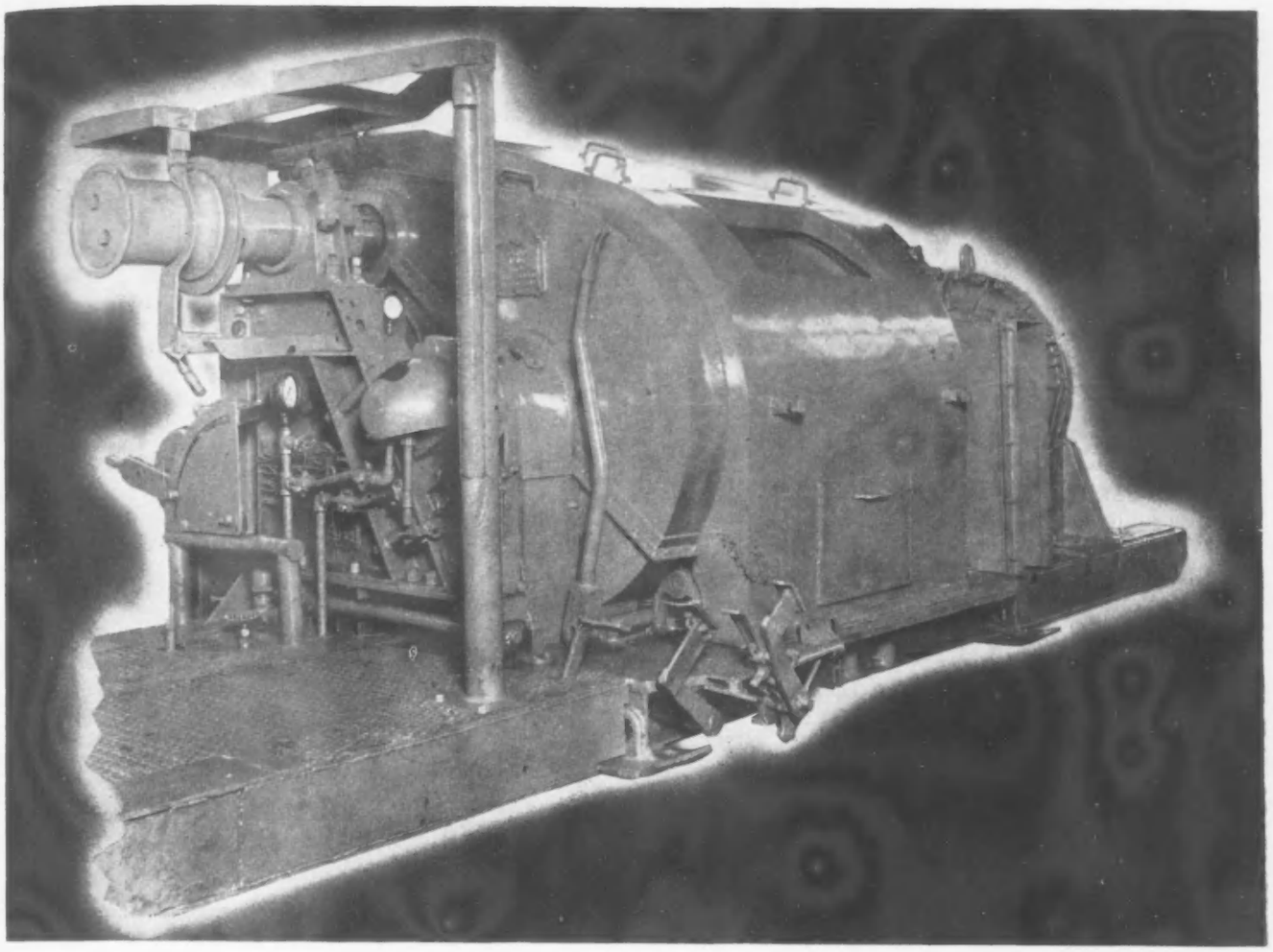
Reno County: Cities Service Oil Company's Terry 1, SW NE 4-26-4w, northeast of Hilger production and southwest of the new Hilger production opened by Phillips Petroleum Company a few months ago, found saturation in the Viola lime, common producing horizon of both fields, and probably will complete to join the two areas.

Rocky Mountain Area

Lost Soldier Tensleep Extended Northwest

Lost Soldier Extenders: Proved limits of the yet undetermined Tensleep area of the Lost Soldier field, Sweetwater County, Wyoming, were extended a quarter mile on the west and northwest sides of the field last week by two producers. Sinclair-Wyoming Oil Company's Unit 103, NE SW NE 10-26n-90w, flowed 311 barrels initial from Tensleep at 5164 feet, total depth 5575 feet. Checking 500 feet higher than the Sinclair Well, Sharpless Corporation's Good 1, SE NW SE 3-26n-90w, swabbed 200 barrels initial from Tensleep at 4733 feet. The Sharpless well is on the northwest flank of the field. Performance of the wells indicates at least 800 acres within proved limits in the Tensleep zone, as compared with 160 acres in the Wall Creek.

Buffalo Basin Test: Stanolind Oil & Gas Company, unit operator joint with the Ohio Oil Company, is moving in rotary for Unit 1, SW SW NE 34-48n-100w, to drill the untested Tensleep zone on Buffalo Basin structure, 40 miles south of the Elk Basin field northern Wyoming, recently proven for prolific Tensleep production. Buffalo Basin has produced gas from Frontier for the past 25 years, and is believed almost a certainty to prove productive in the Tensleep. The unit well is located on west dome of the structure and approximately 3½ miles northwest of



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Fred Goodstein's Pedley 1, drilling at 1943 feet and schedule to test the Tensleep.

Pondera Devonian Test: Following a seismograph survey which reveals that the Devonian high deviates from the Madison lime high underlying the Pondera field, Pondera County, Montana, A. B. Cobb & Company is moving-in rotary for a deep test to the Devonian located half mile south of the Madison production. Cobb holds a block of 6000 acres lying to the east and southeast of the area of Madison production.

California

Shows in Two Wildcats Hold Interest This Week

Shows were reported in two wildcats this week, one, Horace Steele, Operator's Kenwood 1, SE SE SE 17-2-10, Puente area, Los Angeles County; and the other, C. L. Zastrow Oil Co.'s 38-16, SE SW SW 16-30-29, west of Edison field production, Kern County.

In the Puente well, showings first noted at 3640 feet were continuous to the present depth of 3765 feet. The sand is similar to that in the nearby Turnbull Canyon field.

In the prospective West Edison discovery, showings were cored from 4664 feet to the bottom at 4872 feet. The best-looking sand, equivalent of the highly productive Nozu zone, was found between 4800-4850 feet. Casing was set at 4755 feet.

Fresno County: Definite evidence of limitation of the newly discovered Raisin City field, opened last month by Seaboard Oil Company's STU 53-14, 14-15-17, was developed with the drilling of Shell Oil Co.'s San Joaquin 1-1, NE NW 10-15-17, try for an extension about a mile distant from the discovery well. The San Joaquin 1-1, although drilled to 6376 feet, failed to pick up the Eocene sand in which the find was made.

West Texas

Gaines County Wildcat Hits High-Pressure Gas

The Gaines County prospect of Honolulu Oil Corporation on the Homann 640-acre site, C SE SE WTRy 96, Block G, 7 miles northeast of Seminole, confirmed the presence of a structure in encountering high-pressure gas from sand at 3440-43 feet and will set pipe after drilling through the zone. Gas is from Yates, topped at 3370 feet with elevation of 3250 feet, being 61 feet low to Gill et al's Simpson 1, 5502-foot failure situated 4¾ miles southwest. However, this marker is considerably high when correlated with Gulf Oil Corporation's Kottwitz 1, located 5 miles north by west, and abandoned at 6070 feet.

Stanolind Oil & Gas Company's American Warehouse 15, Cedar Lake field, was drilling dry lime at 11,626 feet. Continental Oil Company's Jones 1-A, Northwestern Gaines County, was drilling Lower Permian at 9250 feet. Humble Oil & Refining Company's Cox 1, also an Ordovician project, was drilling at 7050 feet.

Andrews County: The Texas Company's John Mabee 1, C NE SW, Section 37, Block 40, T-2-N, fulfilled its discovery outlook in showing for a commercial oil well when given swabbing test at 4701 feet and 4726 feet. On the latter test the well averaged 17 barrels of 32.8-gravity oil hourly when swabbed for 8 hours. Production test was pending at 4765 feet, then it may be deepened to water so as to determine thickness of the pay, topped at 4636 feet with elevation of 2915 feet, to serve as basis for future development. This strike is 9 miles west of The Texas-New Mexico Pipe Line Company's Slaughter-Midland line, and about half that distance from two other lines.

Ector County: Stanolind Oil & Gas Company's Cowden 1-B, 7000-foot failure a mile west of Holt zone production in North Cowden field, will be deepened to 9500 feet, or the Simpson horizon. Ector County has not been given an Ordovician test, although production has been developed from this formation in counties to the north, south and west.

Deep Prospects: Texas Pacific Coal & Oil Company's Lane 52-A, McCamey field, was drilling shaley-lime at 7800 feet, with next prospective pay zone due from the Waddell, or Basal Simpson. In Pecos County, Phillips Petroleum Company's Price 1 was drilling at 12,836 feet with little progress made for several days, indicating that granite may have been reached. In Dawson County, Gulf Oil Corporation's Dean 1 was drilling lime at 9185 feet. Skelly Oil Company's University 1-M, Andrews County, was drilling at 6920 feet in black shale, topped at 6505 feet with elevation of 3139 feet. Humble Oil & Refining Company's Carter 1 and Crews & Mast 1, both Ordovician projects for Andrews County, were drilling at 9180 and 10,245 feet, respectively.

Wildcats: Pure Oil Company's Martin 1, C SW NE BS&F 7, Block T, will explore a 40,000-acre block, centering 5 miles north of Floydada, Floyd County. In Reagan County, Maloney Drilling Company has sold spreads of acreage for the drilling of a 4000-foot Permian lime test in SEc ELRy 25, Block B.

Winkler County: Magnolia Petroleum Company's Walton 21, ¾-mile southeast of its Kermit-Ellenburger discovery, entered Devonian chert at 8220 feet, 90 feet high, and cemented protection 9⅝-inch at 8273 feet. The company's Walton 234, ¾-mile northwest of the discovery, developed a fishing job after testing gas-cut mud at 6325-78 feet.

East Texas

Second Alba Test Finds Formations High

Plains Production Company et al's Cox 1, Wood County wildcat and second Trinity test for the Alba prospect, retained its high structural position in topping Woodbine at 4345 feet and Georgetown lime at 5105 feet with elevation of 431 feet. The test was drilling at 5820 feet with Paluxy due near the 6200-foot level, but owners are prepared to continue to Lower Trinity. Cox 1 is ¾-mile southeast of Alba, which has Paluxy failure immediately north and a Georgetown dry hole to the south.

Franklin County: Tide Water-Seaboard Oil Company's G. L. Gilbert 1, north offset to the New Hope dual-completion discovery, flowed 66 barrefs of 47-gravity oil initial through ⅛-inch choke on tubing from Pittsburgh sand at 7914-80 feet and 349 barrels of 42-gravity oil through 10/64-inch casing choke from perforations in Rodessa saturation at 7295-7311 feet.

Humble Oil & Refining Company's King 1, situated 2 miles northwest, was fishing drill pipe at 4825 feet, having logged top of Woodbine at 4145 feet and Washita at 4719 feet, with elevation of 370 feet. This outpost is structurally low on these markers.

Kaufman County: Sun Oil Company's Rutledge 1, which recently yielded a prolific head of hot sulphur water from Smackover lime at 10,042-057 feet, will be abandoned after testing water at 3 levels in the Lower Glen Rose series.

Rusk County: Follow-up development for the Henderson pool's recent oil strike from the Pettit lime at 7250-64 feet will be temporarily delayed by the owners to observe the production performance of their discovery, which registered a sharp decline in production and pressures after flowing 231 barrels of 41.8-gravity oil initial following acid treatment with 5000 gallons. Beacon Oil & Refining Company assembled the drilling block, and assigned a half interest to American-Liberty Oil Company for the drilling of the first test on the J. H. Allen 185-acre lease, Taylor Brown Survey, 4¾ miles east of the Joiner sector of the East Texas field.

Tar Field: Problem of producing and marketing the 8-gravity tar-like oil encountered by Jackson et al's McCarley 1-A, Woodbine discovery on the Oak Grove prospect, Wood County, has stymied the owners. The discovery filled 2000 feet from surface with the low-gravity product after perforating sand in Upper Woodbine at 5416-26 feet. Attempts to produce the oil by swabbing failed since the fluod congeals when exposed to lower temperatures near the surface. The oil hardens quickly at room temperature. An analysis is under way to ascertain the properties of the crude, and possible commercial values. Owners later perforated at 5548-62 feet, testing dry, and made a second try for completion in Sub-Clarksville sand, which previously yielded salt water with show of 32-gravity oil from perforations at 5017-20 and 5025-30 feet.

Wildcats: Humble Oil & Refining Company's Mainard 1, Rains County Travis Peak test, was drilling at 6430 feet, having tested water at 6070-6110 feet in Paluxy, topped at 6075 feet. In Franklin County, the company's Hague 1 topped massive anhydrite at 6582 feet with elevation of 343 feet, and was drilling at 6780 feet. Superior Oil Company of California's Groves 1, Van Zandt County, was drilling at 7490 feet. Skelly Oil Company's Chisum 1, Sand Flats prospect, Smith County, entered Georgetown at 5637 feet, and was drilling at 5850 feet.

Manziel Pool: Magnolia Petroleum Company has rigged up for Taylor Heirs 1, and Sun Oil Company is starting Scoggins 1, east and west outposts, respectively, for this new Wood County area, on short-term leases. The former is 1¼ miles south by west of Roger Lavy et al's Shamburger-Magnolia 1, Barnhill Survey, prospective mile northeast extension producer that began flowing oil and wash water after swabbing down 100 feet from surface, from perforations at 6383-96 feet in Paluxy topped at 6375 feet. Broken pay zone at 6388-6403 feet correlates 92 feet low to the nearest producer.

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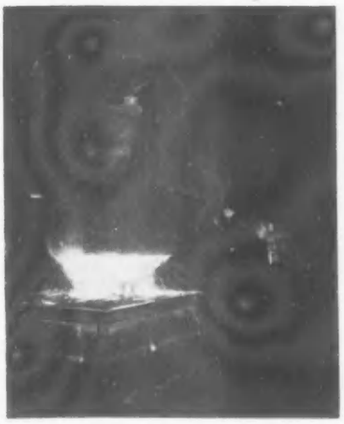

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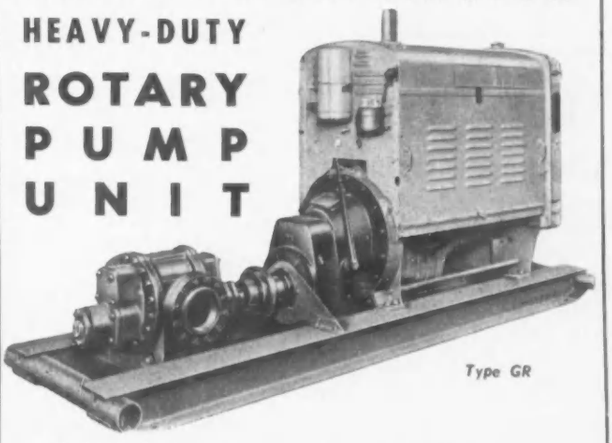

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NEW ORLEANS HOUSTON DALLAS

North Texas

Hardeman County Test Has Shows at Two Levels

Nominal shows from two horizons have been logged by Humble Oil & Refining Company's Dodson 1, Hardeman County Ordovician project, 3 miles northwest of Chillicothe, affording the first encouragement for production being found in the county. Drill-stem test at 4248-77 feet yielded slightly gas-cut rotary mud from Canyon, and test at 4900-25 feet netted 180 feet of oil-cut mud with 930 feet of salt water. Bottom-hole pressure registered 2150 pounds in 6 minutes. The test was drilling shaley-sand at 4970 feet. The company is drilling deep tests in two other counties west of the district's producing area. In King County, Humble Oil & Refining Company's Ed W. Bateman 1 was drilling at 1820 feet with a 37,030-acre supporting block, and operations have been started on an Ordovician project on its Wiltbanks 599-acre lease, Northwestern Haskell County.

Wilbarger County: Phillips Petroleum Company's Waggoner-King 3-W, SW NE NW H&TC 63, Block 14, inside location for the east portion of the Castleberry pool, deepened from 3215-foot lime to 3976 feet without results, but in plugging back to re-complete through perforations at 2936-58 feet the well flowed 196 barrels in 3 hours through ⅛-inch choke. The original well on the lease made a pumper from this upper pay. W. T. Waggoner Estate's Fee 1-PP, T. P. Purnell Survey, 1¼ miles east of a recent Ellenburger discovery, rated at 1080 barrels of 41-gravity oil potential on ¼-inch choke after using 2000 gallons of acid at 4344-84 feet. Ellenburger was topped at 4315 feet, or 112 feet high. Completion of east and west offsets to the discovery has been delayed for pipeline connections.

Clay County: Continental Oil Company and W. B. Omohundro's Stephens 2, west offset to their Stephens pool discovery, flowed 506 barrels of oil on 13-hour test through tubing from perforations at 6020-27 feet in Mississippian, topped at 6023 feet, or 11 feet low. On later test this confirmation well flowed 243 barrels of oil, plus 6 percent bs&w, through ½-inch choke in 8 hours. Bridwell Oil Company's Myers 4, north outpost for Joy field, topped Bend lime at 5518 feet, 42 feet low, and was drilling at 5840 feet. Consolidated Oil Company and L. T. Burns' Edwards 1, wildcat 6 miles east of Henrietta, entered Bend lime at 5425 feet, and was drilling at 5540 feet. Walter Gant et al's nearby 6354-foot failure almost made a commercial producer in a 5900-foot lime.

Cooke County: The Texas Company's Raiser 1, Block 80, broadened Walnut Bend field east in flowing 36 barrels of oil in 2 hours after re-perforating 3 sands between 5556-5634 feet in Winger, topped at 5556 feet. Simpson at 5690-5715 feet was barren. Magnolia Petroleum Company's Presbyterian Church 1, west of the single-well area southeast of the field, proved dry in all Strawn sands, and was drilling at 5616 feet. Sinclair Prairie Oil Company's Art McGeorge 1, Block 65, missed the 4300-foot oil pay, and was drilling at 4805 feet.

That's It!
Cirrus Clouds!

We've been looking around for a word to describe the clouds from which so many bureaucrats and brain trusters dangle. And we've found it. **Cirrus** is the word — "A white filmy variety of cloud usually formed at altitudes of 20,000 to 40,000 feet." Now who couldn't dream up fantasies at such nebulous heights? But a vast number of citizens, feet on solid ground, are determined that all America shall come down to earth when this war ends. Meantime they are mindful of that clause in the Bill of Rights which says "any person may speak, write, and publish his sentiments on all subjects." By being articulate, customers have kept PELCO in line for 32 years — a free private enterprise. What right have bureaucrats and brain trusters, even yet servants of the people, to be more independent? These are things to think about while we win the war.

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Southwest Texas

Two Discoveries Feature Lower Coast Development

Two discoveries, one oil and the other gas, were completed this week in the lower coastal area. A number of other wildcats have indicated production but as yet have failed to yield commercial production.

The Texas Company is completing its wildcat 7 miles southwest of Hebbronville and 3 miles southwest of Yeager field in the northwest portion of Jim Hogg County. The well is Armstrong 1. It flowed 12 barrels of clean pipe line oil hourly through ¼-inch choke. The new field is producing from the Loma Novia sand which was logged at 3247-55 feet, although the well was completed in open hole. Total depth is 3260 feet in shale with 5½-inch casing set to 3247 feet. Operators have skidded the rig to drill Armstrong 2, located 1183 feet north of the discovery, on a 1759-acre tract in SK&K survey 99.

Starr County: Lockhart & Davenport have completed a potential gauge on their gas discovery 1½ miles southeast of the Lockhart field. The Garza 2 flowed 450,000 cubic feet of gas daily with spray of oil through 3/16-inch choke with 500 pounds pressure on the tubing, casing sealed. Perforations were made at 4014-17 feet with 24 shots. The sand is believed to be a stringer coming in above the main Yegua sand pay, topped at 4031 feet. Other perforations were made higher in the hole but they failed to flow oil. Operators have moved the rig to a second location to drill Garza 3, 1320 feet northwest of the discovery in share 37-B, J. A. de la Garza Falcon Grant.

Sun Oil Company is making production tests in Montalvo 1, well in the North Sun field of Starr County that has indicated opening of one or more additional oil sands. Operators ran an electrical survey and took sidewall cores before setting pipe around 5147 feet, total depth. A drill stem test at 5102-10 feet recovered 21 stands of oil and a small amount of oil-cut mud in 15 minutes. Another sand was tested at 4715-75 feet, but showed only gas with a small amount of oil. A trace of oil was recovered on a similar test at 4768-75 feet. This field has sands producing from 4500-, 4900-, 5290-, and 5900-foot sections. The Cockfield sand was recently proved to production when a well on the northwest flank of the structure flowed oil and gas from perforations at 8478-80 feet.

Willacy County: The Willamar field is rapidly developing into a major oil reserve with another important extension on the north side of the field. The latest extension was made by Pan American Production Company in Rodriguez 1. The well flowed 243 barrels daily through ¼-inch choke from a 75-foot sand section at 7850-7525 feet.

Texas Gulf Coast

Second Well Drilling On Chambers Prospect

Wynn Crosby Drilling Company and Kirby Petroleum Company have started a second well in the Jackson Pasture area of Chambers County, Canada & Smith Ranch 1, two miles east of the

same operators gas-distillate discovery as the Jackson Ranch field. Sands in the first well were productive of gas and distillate. Numerous wildcats drilled in this same area have found shows of oil and gas but were not commercial.

In the South Anahuac area, Chambers County, Standard Oil Company of Texas and Salt Dome Oil Company are drilling directionally at 8700 feet under Trinity Bay in State 1-21, a wildcat. The rig is set on shore with the drill bit deflected in the bay area.

Fort Bend County: Phillips Petroleum Company is still making flow tests on Robinson 3, wildcat on the southwest flank of Blue Ridge dome. With the hole bottomed at 4480 feet, the last test was made in sand at 4105-09 feet but the flow was not steady. This apparent discovery is in Hicks Shropshire survey.

Jefferson County: Sun Oil Company is making production tests on Quinn 1, wildcat in the Helbig area. Although details have not been announced, the tests were reported made around 8309 feet and that some oil and gas shows have been encountered. This well, located in the Savery and Williams Leagues, is the company's second test in the area.

In the North Fannett area, The Texas Company is fishing for stuck drill pipe in Barnes 1, Manuel Chirino League. Bottom is at 8350 feet in sidetracked hole.

Wildcats: Sun Oil Company has started drilling in Strnadel 1, wildcat 4 miles southwest of Midfield in Matagorda County. Navarro Oil Company has spudded Roberts 1, projected Wilcox test in Shepherd area of San Jacinto County. This test is a scheduled 9300-foot test. In Jasper County, Sun Oil Company is spudding Richardson 1, wildcat on the Antioch prospect 5 miles southwest of Buna. The test is contracted to 8250 feet.

South Louisiana

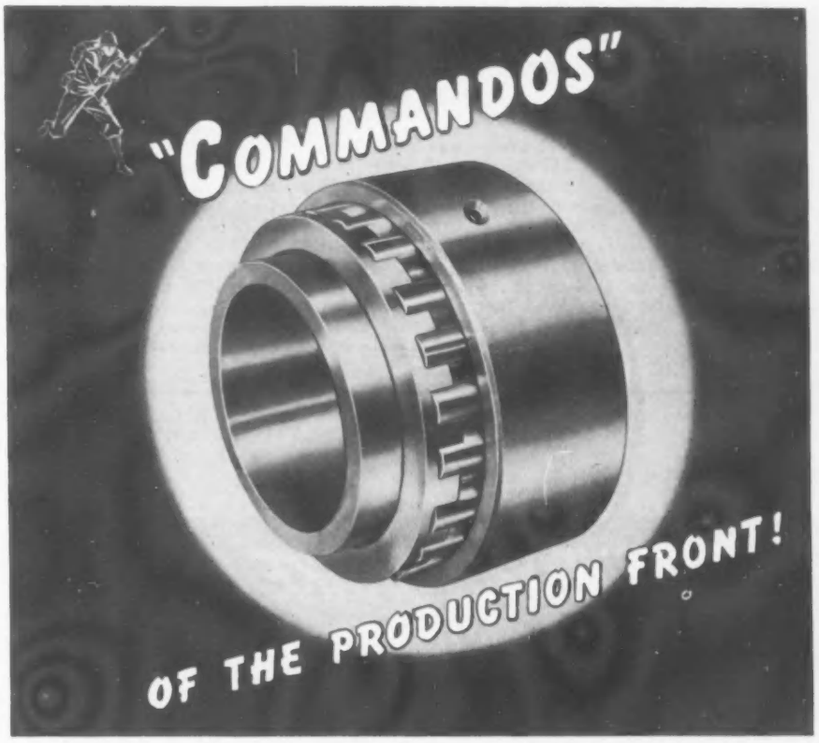
Evangeline Prospective Well Undergoing More Tests

Danciger Oil & Refining Company is making additional tests on its prospective discovery in the Reddell area of Evangeline Parish. Several Wilcox sand sections were logged in the well, Haas 1, and last perforations were made at 11,792-812 feet. Operators made three drill-stem tests of the level but the first two failed due to extreme heat and pressure. When the third drill-stem test was broken down the recovery was 35 stands of mud and water, 14 stands of oil and mud and 30 stands of salt water. The perforations have been squeezed and a test will be made higher in the hole.

One mile west of the Danciger discovery at Reddell, Continental Oil Company and Humble Oil & Refining Company ran electrical survey to 11,348 feet in Pardee 3, and is now coring deeper in the Wilcox. It is reported that this well, due to a system of faulting, is running considerably higher than the Danciger well.

Considerable interest is being shown in the area with Lyle Cummins of Lafayette, Louisiana, staking location for a Wilcox test, Quick 1, Section 21-4s-1w. The location is half way between the Danciger and Continental wildcats.

Vermilion Parish: Humble Oil & Re-



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fining Company is making first production tests on Louisiana Furs 1, wildcat in the Pecan Island area. The hole is bottomed at 11,623 feet with 5½-inch casing set near bottom. The company has drilled two gas wells in the area, Louisiana Furs 1 completed in perforations at 10,832-47 feet and Louisiana Furs 2 flowing from perforations at 7515-30 feet.

Cameron Parish: Potential gauge has completed on the new Miocene sand pay in Big Lake field. Continental Oil Company's Hebert 1, Section 18-12s-8w, flowed 152 barrels of 39.5-gravity oil daily through 7/64-inch choke from perforations at 8571-86 feet. This well, which opens the first Miocene pay in the field, was drilled to 13,084 feet and plugged back to 8591 feet for completion.

Acadia Parish: Sun Oil Company and Continental Oil Company have set protection pipe to 9525 feet, total depth, in Homeseekers 2, semi-wildcat in Section 54-10s-1w of the Estherwood area. Electrical log was run to 9000 feet before resuming drilling and setting the protection string.

St. James Parish: Humble Oil & Refining Company is making a new flow test in Canal Bank & Trust 1-B, well in the Hester area, above the 10-540-foot level. Previously, the operators made a test around 10,630 feet which flowed 12 barrels of distillate daily with considerable gas.

In the St. James area, Humble has been coring below 10,600 feet in Zeringue & Sons 1, second well in the area. This company only recently established the area to production.

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Michigan

Arenac Wildcat Produces Oil From Dundee

A new Dundee pool prospect was indicated with Don Rayburn's State 1, N½ NW NE 33-20n-3e, Moffatt Township, Arenac County, flowing 39 barrels of oil in 19 hours without benefit of a casing string to the top of the producing horizon. Dundee was logged at 2915 feet, elevation 773 feet, with a pay at 2982-85 feet. The well is four miles north of the North Adams Dundee pool and a mile north of a shallow gas well.

Wexford County: Cherokee Oil Company may abandon Wood 1, S½ SW NW 19-22n-9w, Haring Township, with only a trace of oil and gas showing through 2500 feet of water following perforating in both Dundee at 3700-3712 feet and Monroe at 3835-3842 feet. Cores had indicated a potential producing zone in Dundee. Companies had backed the test both by acreage purchases and dry-hole contributions and more work may be undertaken before abandonment.

Osceola County: Rose Lake field, a 1943 discovery, again was set back as a Dundee horizon prospect when Ohio Oil Company's Howe 1, S½ SE SW 31-19n-9w, west offset to the discovery, drilled the Dundee-Monroe beds without logging oil saturation. Operators plugged back to 3165 feet and completed for a 250-barrel well in the Traverse, however. Failure of the west offset, a high well structurally, crippled the district's outlook, as the Traverse already has been restricted on the south and north as a producing zone.

Proration: State proration will be applied on two new pools, restricted further on three others and eliminated entirely on another October 1, P. J. Hoffmaster, state well supervisor, announced following a public hearing September 24. At the same time three other fields, Reed City, Headquarters and North Adams—source of about 35 percent of the state's total production—will be continued under proration without revision from current schedules.

The new schedule will bring Goodwell in Newaygo County and Rose Lake in Osceola County under proration the first time on a basis of 262½ barrels per day for 40-acre unit wells. Evart, Fork and Prosper, heretofore on a 262½-barrel basis, will be cut to a maximum of 150 barrels per day. With only three wells still able to make the allowable, all proration was lifted in the Winterfield pool.

F. R. Frye, state petroleum engineer, said the new schedule would not make any material change in his previous estimate of 56,789 barrels per day production for October. Frye said that in July the last month for which complete records were available, Michigan averaged 36,880 barrels from prorated pools and 19,760 barrels from unprorated fields per day.

Union and Continental Drilling in Arizona

Union Oil Company and Continental Oil Company will drill a joint test in the Holbrook area of Navajo County, Arizona. Location has been staked in the NE NE NE 19-15n-18e, on lands of Aztec Land & Cattle Company. The test will be drilled to granite, expected at approximately 5000 feet. Manning & Brown, of Denver, will do the drilling.

United States Well Completions

ARKANSAS

Lafayette County—McKamie: Lion Oil Refining Co.'s Wheat 1, 35-17s-24w, flow 25 bbls, 9362 ft.

Lafayette County—Midway: Barnsdall Oil Co.'s Community Powell 4, nw nw 10-15s-24w, topped oil saturation at 6,442 ft, no gauge, td 6480 ft.

Nevada County—Smart: McAlester Fuel Oil Co.'s F. S. Green 1, 2-15s-20w, oil, no gauge, td 2524 ft.

Columbia County—Smart: Crow and O'Farrell's Guttry B-2, producing from Tokio, ne nw ne 11-15s-20w.

Columbia County—Atlanta: Tidewater Associated's Hutchison B-1, 17-18s-19w, flow 160 bbls, ¼-in, 8225 ft.

ARKANSAS WILDCAT

Calhoun County—Failure: Placid Oil Co.'s Calion 1, 12-16s-14w, abnd 3000 ft.

CALIFORNIA

Fresno County—Coaling, Old Field: Standard's Continental 34, ne nw sw 2-19-15, pump 70 bbls 15.9-gr oil, 19 water, perf 1915-1890, 1870-1848 ft, td 2184 ft.

Standard's 81-33A, ne ne ne 35-19-15, pump 72 bbls 18-gr, 190-ft perf 2495 ft, td 2505 ft.

Kern County—Belridge, South: Belridge Oil Co.'s 35A-34, ne ne se 34-28-21, pump 40 bbls, perf 590-811, 966-1059, 1114-1175 ft, td 1175 ft.

Chanslor Canfield Midway Oil Co.'s S 11-11, nw sw 11-29-21, pump 20 bbls 14-gr, perf 1000-1005, 1035-1040, 1050-1055, 1090-1095, 1105-1120 ft, td 1048 ft.

General Pet. Corp.'s 23-12, nw se nw 12-28-21, pump 77 bbls 13.4-gr oil, 7 water, perf 813-963, 1017-1046 ft, td 1048 ft.

Kern County—Edison: Wood Callahan Oil Co.'s Shearer 1, se sw ne 21-30-29, flow 200 bbls, 3814 ft.

Kern County—Kern Front: Pacific Western's Robinson A-17, nw ne nw 22-28-27, pump, no est, perf 2215-2420 ft, td 2425 ft.

Kern County—Midway Sunset: H. & T. Oil Co.'s 12, nw ne nw 15-31-22, pump 2 bbls 12.6-gr, 210-ft perf 915 ft, td 915 ft, pd 765 ft.

Standard's 72-29D, sw ne ne 29-32-24, flow 460 bbls 24.5-gr, 1-in, 80/0 lbs, 78-ft perf 3418 ft, Calitroleum 3270 ft, td 3420 ft, pd 3690 ft.

Standard's 115-31E, 31-12-23, pump 8 bbls 25.9-gr, td 3540 ft, pd 3280 ft.

Standard's 53-5C, nw sw ne 5-32-23, Calitroleum 3256 ft, Miocene 3466 ft, abnd 3516 ft.

Kern County—Mount Poso: General Pet. Corp.'s 21-13, ne sw nw 21-27-28, pump 200 bbls 15.4-gr, 50-ft perf 1900 ft, td 1900 ft.

Kern County—Poso Creek-Premier: Standard's 14-9, nw ne nw 9-28-27, pump 53 bbls oil, 60 water, 155-ft perf 2815 ft, td 2820 ft.

Kern County—Round Mountain: Trico Oil & Gas Co.'s Coffee 14, nw ne nw 8-28-29, pump 4 bbls oil, 42 water, perf 1285-1300, 1218-1258 ft, td 1312 ft.

Los Angeles County—Long Beach: (Old well deepened) General Exploration Co.'s Pool 3, 661 sely along e/l P. E. Ry. fr c/l San Antonio Drive thence 145 ft swly at 90 deg, pump 156 bbls 25.8-gr, perf 4795-4840 ft, otd 4182 ft, td 5535 ft.

Los Angeles County—Wilmington: General Pet. Corp.'s Terminal 12, 5334 ft s, 1554 ft w c/l Ford and Anaheim Blvds, pump 177 bbls 14.4-gr, 95-ft perf 2605 ft, td 2610 ft.

Long Beach Oil Dev. Co.'s W 62, 40 ft swly along n/l Seaside Blvd fr w side 24th Ave, thence 306 ft sely at r/a, pump 315 bbls 15.6-gr, perf 3286-3752 ft, td 3757 ft.

Orange County—Huntington Beach: Southwest Exploration Co.'s State J-6, 981 ft wly along proj c/l Ocean fr c/l 23rd St thence 123 ft nly, flow 336 bbls 20.1-gr, 14/64-in, 60/1000 lbs, 1007 ft perf 3454 ft, td 3454 ft.

Standard's Huntington Comm 1-1, 1402 ft s along c/l Huntington Ave fr c/l Ellis Ave thence 76 ft e at r/a, pump 22 bbls 15.9-gr oil, 7 water, 29-ft perf 3949 ft, td 3955 ft.

Orange County—Yorba Linda: (Old well deepened) George Morgan's Fricke 3, 21-3-9, pump 84 bbls 16-gr oil, 16 water, 185-ft perf 2117 ft, otd 1914 ft, td 2142 ft.

CALIFORNIA WILDCATS

Fresno County—Failure: Seaboard-Pure Oil Co.'s Corehole 1, sw 28-17-14, Cantua Creek area, abnd 972 ft.

Madera County — (Gas Discovery): Texas Co.'s Moffat 1-7, nw nw nw 7-12-15, Firebaugh area, 6,500,000 gas, ½-in, perf 3935-3920 ft, td 4308 ft, pd 4000 ft.

Santa Barbara County—Failure: Texas Co.'s Petan 1, sw se se 20-6-32, Santa Rosa area, abnd 1743 ft.

Ventura County—Failure: Wilshire Annex Oil Co.'s Ford 1, se nw se 1-3-19, Wiley Canyon area, abnd 626 ft.

ILLINOIS

Christian County: Mid-Illinois Oil Co.'s Ralph 2, se nw ne 27-15n-2w, abnd 1929 ft.

Clay County: B. F. Williams' Green 3 se nw ne 30-3n-6e, Benoist 2692-2704 ft, 46 bbls, 2706 ft.

W. C. McBride's Busby 2, se se ne 34-4n-7e, abnd 2623 ft.

W. C. McBride's Henry Franklin 1, se ne ne 34-4n-7e, abnd 2682 ft.

Texas Co.'s Byers 4, ne se nw 14-5n-5e, Aux V 2348-58 ft, 33 bbls, 2358 ft.

Clinton County: Markham Drilling Co.'s Webber Comm. 1, c nw nw 1-2n-2w, abnd 2684 ft.

Edwards County: Magnolia's Matthes 1, ne se ne 10-1n-14w, abnd 2918 ft.

Ohio's Hayes 1, sw se 4-1n-10e, McCl 3269-75 ft, 81 bbls, 3313 ft.

Olds Oil Co. et al's Ebbison 1, e½ ne sw 9-1n-10e, abnd 3310 ft.

Texas Co.'s Shelby Gillespie Comm. 1, c sl ne nw sw 10-1n-10e, abnd 3320 ft.

Skelly's Fieber 1, sw se nw 20-2s-14w, Aux V 3010-33 ft, 85 bbls, 3340 ft.

Effingham County: Walter Duncan's Brink 2, nw sw sw 34-6n-7e, Weller 2527-34 ft, 70 bbls, 2534 ft.

Gulf's Shirley 2, ne ne se 34-6n-5e, Benoist 2290 ft, Rosi 2409 ft, 37 bbls, 2419 ft.

Fayette County: Carter's Clow 4-D, sw ne 15-8n-3e, disposal well, salt water, 3238 ft.

Gallatin County: Cherry & Kidd's Kerwin 21, se ne nw 14-8s-10e, Tar Springs 2032-44 ft, Cypress 2371-92 ft, 300 bbls, 2392 ft.

Franklin County: Ohio's U. S. Coal & Coke Co.'s nw nw sw 13-6s-3e, abnd 3110 ft.

E. S. Adkins' Clayton S 2, sw nw sw 30-7s-3e, Tar Springs 2073-2113 ft, 54 bbls, 2119 ft.

E. S. Adkins' Sherman-Boner 2, nw ne nw 31-7s-3e, abnd 2200 ft.

Hamilton County: Texas Co.'s Flannigan 2, sw se se 17-4s-7e, abnd 3426 ft.

Wm. Layton and John Myers' J. L. Smith 1, ne ne sw 23-6s-5e, abnd 3345 ft.

Shulman Bros.' Hall 1, c se sw sw 8-6s-7e, abnd 3062 ft.

Texas Co.'s Wheeler 2, se sw sw 18-6s-7e, Tar Springs 2421-54 ft, 293 bbls, 2454 ft.

Jasper County: Gulf's Sterchi 3, e½ ne sw 25-5n-10e, McCl 2998-3004 ft, 32 bbls, 3014 ft.

Jefferson County: Anthony V. Stephens' Luchsinger 2, nw se nw 3-1s-2e, Benoist 1975-82 ft, 15 bbls, 1982 ft.

Marion County: Texas Co.'s Freidrich 1, nw ne sw 15-1n-2e, Rosi 2097-2115 ft, 58 bbls, 2118 ft.

Texas Co.'s Freidrich Comm. 2, ne ne sw 15-1n-2e, abnd 2152 ft.

Texas Co.'s Fricke 3, sw ne ne 16-1n-2e, Benoist 1904-08 ft, 63 bbls, 1908 ft.

Richland County: Pure's A. Grubb B 1, c ne ne 36-3n-8e, McCl 3036-67 ft, 225 bbls, 3070 ft.

Ohio's Childs 1, c se ne 20-2n-14w, McCl 3128-34 ft, 81 bbls, 3203 ft.

Wabash County: Texas Co.'s Geiger 4, ne se se 8-1s-12w, Weller 1991-2008 ft, 50 bbls, 2008 ft.

Wabash County: W. E. Bailor et al's Beaman 1-A, sw se 27-1n-13w, L O'H 2649-59 ft, 125 bbls, 2659 ft.

Wayne County: Texas Co.'s B. Talbert 7, sw nw nw 16-1s-6e, Aux V 3036-48 ft, 70 bbls, 2048 ft.

Buren & McGregor's Buss 1, nw sw 33-1s-7e, abnd 3325 ft.

Pure's Duke Cons 1, se sw sw 35-2n-7e, abnd 3130 ft.

White County: British American's Metcalf 2-A, Penn 1566-79 ft, 40 bbls, 1579 ft.

Tidewater's Lawrence 1, se se se 24-4s-10e, Cypress 2699-2729 ft, Benoist 2831-45 ft, 87 bbls, 2845 ft.

Phillips' Laura 2, se sw sw 19-4s-11e, Benoist 2818-30 ft, 25 bbls, 2830 ft.

ILLINOIS WELLS DEEPENED

Marion County: Kingwood's Shanafelt A 22, nw nw ne 20-2n-2e, Devonian 4261-4527 ft, otd 3420 ft, 222 bbls, 4634 ft.

White County: W. C. McBride's Clavin 2, se ne sw 6-4s-14w, Aux V 2900-20 ft, otd 2333 ft, 149 bbls, 2920 ft.

Kingwood et al's McKennzie 2, sw nw sw 12-7s-8e, Aux V 2893-2911 ft, otd 2752, 30 bbls, 2911 ft.

ILLINOIS WILDCATS

Cumberland County — Failure: Nat'l Consumers Oil Co.'s Stevenson 1, c ne sw 8-9n-9e, abnd 2675 ft.

Edwards County—Oil Discovery: Deep Oil Co.'s Sutton 1, s½ nw sw 33-2s-10e, McCl 3328-35 ft, 400 bbls, 3352 ft.

Jackson County—Failure: Nash Redwine et al's Heitle 1, sw se nw 10-8s-1w, abnd 2352 ft.

Jefferson County—Failure: Nat'l Pet. Co.'s

Wells Completed in United States in Week Ended October 2, 1943

Data preliminary and subject to revision. Revised and more complete data on all completions shown in monthly summary of drilling, published in second issue of each month. More detailed data on wildcats published in third issue of each month.

State or District	FIELD COMPLETIONS: New Wells *Oil	Gas	†Input	Dry	Total	Old Wells Deepened	WILDCAT COMPLETIONS *Oil	Gas	Dry	Total	ALL COMPLETIONS: This Week	Last Week	Cumulative: This Year	Last Year
Alabama	....	....	....	....	....	....	....	....	....	....	....	....	2	3
Arizona	....	....	....	....	....	....	....	....	....	....	....	....	4	2
Arkansas	3	....	....	1	4	....	....	....	....	....	4	2	158	175
California	18	....	....	1	19	1	....	1	3	4	24	27	1,180	578
Colorado	....	....	....	....	....	....	....	....	....	....	....	....	21	12
Florida	....	....	....	....	....	....	....	....	....	....	....	....	1	....
Georgia	....	....	....	....	....	....	....	....	....	....	....	....	1	2
Illinois	21	....	1	15	37	3	2	....	8	10	50	29	1,402	1,584
Indiana	4	....	....	7	11	....	2	....	1	3	14	5	199	294
Kansas	33	....	....	11	44	....	....	....	9	9	53	32	1,296	1,256
Kentucky	10	....	....	6	16	....	1	....	4	5	21	12	291	113
Louisiana	3	1	....	2	6	....	1	....	1	2	8	6	444	739
North Louisiana	....	1	....	....	1	....	....	....	1	1	2	2	184	....
South Louisiana	3	....	....	2	5	....	1	....	....	1	6	4	260	....
Michigan	2	2	....	2	6	....	1	....	3	4	10	16	441	527
Mississippi	....	....	....	....	....	....	....	....	....	....	....	....	....	88
Missouri	....	....	....	....	....	....	....	....	....	....	....	....	....	24
Montana	....	....	....	....	....	....	....	....	....	....	....	....	....	163
Nebraska	....	....	....	....	....	....	....	....	....	....	....	....	....	28
New Mexico*	3	....	....	....	3	....	....	....	1	1	4	5	200	314
New York	15	....	10	....	25	....	....	....	....	....	25	25	887	964
Ohio	3	....	....	2	5	....	....	....	....	....	5	5	636	850
Oklahoma	9	1	1	8	19	2	1	....	11	12	33	24	1,056	1,106
Pennsylvania	32	3	18	....	53	1	....	....	....	....	54	57	2,076	3,114
Tennessee	....	....	....	....	....	....	....	....	....	....	....	....	....	8
Texas	42	2	....	19	63	7	5	....	21	26	96	89	3,143	4,314
E.Tex.Bor.Co.'s	....	....	....	....	....	....	....	....	....	....	....	....	16	....
East Texas Field	....	....	....	....	....	....	....	....	....	....	....	....	5	....
Rest of E. Texas	2	....	....	....	2	....	1	....	1	2	4	6	168	....
North Texas	14	....	....	13	27	2	2	....	4	6	35	24	772	....
W.Central Texas	2	....	....	3	5	....	....	....	1	1	6	7	285	....
West Texas	11	....	....	1	12	5	....	....	1	1	18	22	694	....
Texas Panhandle	3	....	....	....	3	....	....	....	....	....	3	3	151	....
G. Coast, Upper	1	....	....	1	2	....	....	....	2	2	4	10	245	....
G. Coast, Lower	6	....	....	1	7	....	1	....	3	4	11	12	482	....
Southwest Texas	3	2	....	....	5	....	1	....	9	10	15	5	283	....
S. Central Texas	....	....	....	....	....	....	....	....	....	....	....	....	42	....
West Virginia	2	12	....	3	17	....	....	....	....	....	17	14	493	573
Wyoming	....	....	....	....	....	....	....	....	....	....	....	....	85	78
Total U. S.	200	21	30	77	328	14	13	1	62	76	418	348	14,016	16,909

* Includes distillate wells. † Includes salt water disposal wells.

Ansell 1, se ne nw 13-3s-1e, abnd 2500 ft.

Jefferson County—Failure: Sohio Prod. Co.'s Jefferson Oil & Gas 1, nw nw nw 16-4s-2e, abnd 2802 ft.

Macoupin County—Failure: W. L. Topf's Beasley & Way 1, se se nw 2-12n-6w, abnd 731 ft.

Marion County—Oil Discovery: Gulf's W. Floyd 1, se se nw 25-1n-3e, McCl 2730-40 ft, 155 bbls, 2763 ft.

Richland County—Failure: Sohio Prod. Co.'s E. Heap et al 1, sw sw sw 19-3n-11e, abnd 3309 ft.

Shelby County—Failure: B. M. Heath et al's W. C. Carnes 1, nw ne nw 35-11n-4e, abnd 2041 ft.

St. Charles County—Failure: S. A. Pearce, Tr.'s Ross Goodwin 1, c w½ se nw 28-5n-10w, abnd 1665 ft.

INDIANA

Gibson County: R. D. Brown's Graulich 2, ne ne se 36-1s-10w, abnd 1525 ft.

R. D. Brown's Martha Mahan 2, sw ne sw 36-1s-10w, abnd 1372 ft.

Continental's A. Maier 61, sw sw sw 12-3s-14w, Cypress 2483-2502 ft, 45 bbls, td 2506 ft.

Continental's Bogeman Land Co. 63, ne sw se 24-3s-14w, abnd 2147 ft.

L. J. Lloyd's Lane 1, w½ sw nw 23-1n-10w, abnd 2032 ft.

K. D. Holland's Phillips 1, c w½ sw 111-1n-10w, McCl. 1832-38 ft, 75 bbls, td 1854 ft.

Pasey County: A. C. Thomas et al's F. A. Bailey 2, ne sw se 28-4s-13w, abnd 3078 ft.

Spencer County: Chas. Leeper et al's Kennedy 3, se nw nw 34-6s-5w, Aux V. 982-92 ft, 5 bbls, td 994 ft.

Kelly et al's Niles 1, nw ne nw 1-8s-7w, abnd 925 ft.

Vandenberg County: Cherry & Kidd's Sensmeir 1, ne sw sw 2-5s-11w, abnd 2573 ft.

White County: Superior's New Harmoney Realty 33, c se 34-4s-14w, Cypress 2598-2606 ft, Aux V. 2834-52 ft, McCl. 2909-10 ft, 130 bbls, 2938 ft.

INDIANA WILDCATS

Gibson County—Failure: G. M. Cornelius' Hagenback & Pickering 1, nw ne se 2-2s-9w, abnd 1454 ft.

Pasey County—Discovery: A. C. Thomas et al's F. A. Bailey 1, sw se 28-4s-13w, Walt. 2183-97 ft, 150 bbls, 2215 ft.

Wabash County—Discovery: George & Rather's C. McLinne 1, 4-1s-12w, Cypress 1982-93 ft, 40 bbls, 1993 ft.

KANSAS

Barber County—W. Deerhead: Champlin's Baird 1, se ne sw 22-32s-15w, Arbuckle 5226 ft, abnd 5398 ft.

Barton County — Kraft-Prusa: Gulf's Redetzke 2, c ne ne 19-16s-11w, Arbuckle 3324 ft, 2000 gal acid, swab 121 bbls, 3328 ft.

Barton County—Marchand: M. Marchand's No. 3, c nw sw 13-20s-12w, abnd 3447 ft.

Barton County: Sinclair Prairie's Seyfert A 8, Arbuckle 3364 ft, abnd 3389 ft.

Barton County—Trapp-Susank Area: Branine & Hall's Deutsch 1, c s sw ne 9-16s-13w, Arbuckle 3390 ft, pump 77 bbls, 3391 ft.

Barton County—W. Ainsworth: Black-Marshall's L. W. Ainsworth 3 c nw sw 33-16s-13w, Arbuckle 3395 ft, pump 763 bbls, 3400 ft.

Barton County—Trapp Area: Virginia Drilling Co.'s Stickey 1, se se nw 24-16s-14w, Arbuckle 3434 ft, abnd 3454 ft.

Barton County—Kraft Prusa: Black-Marshall's Grossardt 4, ne se nw 4-17s-11w, Arbuckle 3340 ft, 1000 gal acid, pump 429 bbls, 3343 ft.

Barton County—Bloomer: Champlin's Nagel B 1, c n se nw 24-17s-11w, Arbuckle 3305 ft, abnd 3318 ft.

Butler County—Eldorado: Darling et al's Robison 3, sw nw sw 17-25s-5e, chat 2510 ft, pump 150 bbls, 2541 ft.

Cowley County — Rock: Stelbar Oil Co.'s Boeger A 1, c ne sw 21-30s-4e, pump 100 bbls, 2831 ft.

Cowley County—Deishman: Trees Oil Co.'s Franks 5, nw ne se 23-31s-4e, Mississippi 2935 ft, shot 80 qts, flow 994 bbls, 2937 ft.

Ellis County—Bemis: Cities Service's DeHoff 3, nw nw sw 30-11s-16w, Arbuckle 3415 ft, abnd 3453 ft.

Ellis County—Solomon: Darby's Soloman 1, nw nw ne 33-11s-19w, wo, otd 3631 ft, Arbuckle 3626 ft, pb 3539 ft, perf Lansing 3501-21 ft, abnd 3626 ft.

Ellsworth County—Stoltenberg: Cities Service's Schroeder C 3, c sw nw 34-16s-10w, Arbuckle 3249 ft, pump 398 bbls, 3269 ft.

Greenwood County—Virgil: Aikman & Braden's Mennonite 5, c nw ne sw 11-24s-12e, Miss. 1725 ft, pay 1749-49 ft, pump 15 bbls, 1947 ft.

Leavenworth County—McLouth: Chas. Miller's Mason 1, sw sw nw 4-10s-21e, Miss. 1323 ft, abnd 1377 ft.

Marion County—Lost Springs: Derby and Carey's Popisil 1, ne nw ne 16-17s-4e, Miss. 2359 ft, pump 100 bbls, 2370 ft.

McPherson County — Lindsborg: Dickey's Litijestrand 2, c ne sw 24-17s-4w, Viola 3446 ft, 2500 gal acid, pump 694 bbls, 3450 ft.

Pratt County—N. Iuka: R. D. Petrowsky's No. 3, sw ne ne 30-26s-12w, Arbuckle, 500 gal acid, pump 552 bbls, 4339 ft.

Pratt County — N. Stark: Skelly's Blackburn 1, c sw nw 7-26s-11w, Viola 4132 ft, pb 4141 ft, 3000 gals acid, pump 247 bbls, 4166 ft.

Pratt County: Margay Oil Co.'s Delaney 1, ne ne ne 13-26s-12w, Viola 4154 ft, 500 gal acid, flow 54 bbls hr, ½-in, BHB 6227 bbls, 4160 ft.

Pratt County—Carmi: Shell's O. M. Hoeme 1, sw sw nw 28-26s-12w, Arbuckle 4261 ft, 1000 gal acid, BHB 61,390 bbls, 4304 ft.

Pratt County: Skelly's Hoeme 2, sw sw nw 29-26s-12w, Arb. 4284 ft, 4500 gals acid, 3024 bbls, 4311 ft.

Pratt County: British American's Petrowsky 3, ne se ne 30-26s-12w, Arb. 4301 ft, pb 4328 ft, 4500 gal acid, pump 78 bbls, 4332 ft.

Pratt County—N. Iuka: Skelly's Knop B 4, sw ne se 25-26s-13w, Arb. 4309 ft, 2000 gal acid, 5084 bbls, 4328 ft.

Pratt County—Cunningham: Skelly's Fitzsimmons 2, c ne sw sw 35-27s-11w, Lansing 3487 ft, pay 3520-26 ft, pump 500 bbls, 3527 ft.

Reno County—Peace Creek: J. L. Jessup's 1, c se ne 16-23s-10w, Viola, 2000 gals acid, BHB 1659 bbls, 3768 ft.

Reno County—Zenith: Cities Service's Freeman 3, c ne se 6-24s-10w, Viola 3720 ft, 1000 gals acid, flow 225 bbls, 3730 ft.

Rice County — Orth: W. N. Bartlett's Schmidt 1, c w se se 16-18s-10w, Arb. 3260 ft, pump 25 bbls, 3283 ft.

Rice County—Silica: Stanolind's Joseph R. Bowman 1, ne ne sw 22-19s-10w, Arb. 3290 ft, shot 10 qts, 3500 gals acid, pump 225 bbls, 3301 ft.

Rice County — Keesling: Cities Service's Jones 5, sw se ne 17-20s-9w, Arb. 3289 ft, 1500 gals acid, pump 321 bbls, 3292 ft.

Rice County—Welsh Area: Nelson Drilling Co.'s Lackey 1, se ne nw 1-21s-6w, Miss. 3339 ft, abnd 3382 ft.

Rooks County—Laton: Cities Service's Adams 1, c s ne se 33-8s-16w, Lansing 3059 ft, Topeka 2799 ft, 4000 gals acid, pump 190 bbls, 3132 ft.

Russell County—W. Greenvale: Cities Service's Marsh C 1, c sw sw 29-14s-12w, Gorham 3164 ft, pump 238 bbls, 3166 ft.

Russell County—Hall-Gurney: Gulf's Fink 4, c nw se 15-14s-14w, Kansas City 3000 ft, 5000 gals acid, pump 403 bbls, 3258 ft.

Russell County: Helmerich & Payne and and Ohio's Holl 6, ne nw (150 ft ne of c) 22-14s-14w, Kansas City 3023 ft, 4000 gals acid, pump 251 bbls, 3113 ft.

Russell County—Trapp: Shield's Rogg 7, c n nw nw 9-15s-13w, K. C. 3021 ft, 6000 gals acid, pump 373 bbls, 3340 ft.

Russell County: Transwestern and Western Pet. Co.'s Boomhower 6, c ne sw 19-15s-13w, Arb. 3298 ft, 1000 gals acid, pump 278 bbls, 3315 ft.

Sheridan County—Studley: Union of California's Pratt 4, nw se sw 23-8s-26w, Lans. 3674 ft, 2000 gals acid, pump 350 bbls, 3808 ft.

Stafford County—Drach: Stanolind's Henry Krakenberg 2, c sw sw 6-22s-12w, Arb. 3664 ft, 500 gals acid, swab 21 bbls, depth test 2362 bbls, 3666½ ft.

Stafford County—Un-named: Skelly's Campbell A 2, sw ne sw 34-24s-15w, Arb. 4401 ft, 3500 gals acid, pump 415 bbls, 4424 ft.

Stafford County—Grunder: Cities Service's Greenwood 1, sw sw ne 6-25s-15w, Arb. 4442½ ft, abnd 4485 ft.

Woodson County — Winterschied: Kornfeld & Harper's Winterschied 1, nw ne se 6-24s-14e, Miss. 1718 ft, abnd 1760 ft.

KANSAS WILDCATS

Barber County—Failure: Superior's Mitchell 1, nwc 15-33s-15w Viola 5195, Simpson 5315 ft, Arb. 5432 ft, abnd 5462 ft.

Graham County—Failures: Hollow Drilling Co.'s Wiesner 1, nwc 31-7s-21w, Topeka 3165 ft, Lans. 3410 ft, B. K.C. 3615 ft, Cong. 3695 ft, Arb. 3733 ft, abnd 3753 ft.

Mid-Continent et al's Hazen 1, c se se 18-8s-25w, Topeka 3313 ft, Lans. 3687 ft, B.

The OIL WEEKLY'S TRADING POST

USED EQUIPMENT FORUM

CLASSIFIED ADS . . . EQUIPMENT . . . SERVICES . . . PERSONNEL

FOR SALE

● **FOR SALE: 1—14 x 12 Gardner Denver Twin Cylinder-Piston Valve Type Roller Bearing complete enclosed oil bath-steam engine mounted on 10 x 12 H Beam steel skids with necessary cross members and braces 20 feet long with National steam separator and trap-force feed oil pump and 6" Badgett steam lubricator for dual oil system-3" Brown throttle valve-22 tooth dual drive split sprocket for 1240 double chain. All the above mounted in unit and completely piped and fitted for steam connection.**

2—12 x 12 Oil Well Supply Twin Cylinder Steam Engines mounted-fitted and equipped same as above. Approximate HP 750.

None of these engines needs overhauling or repairs. They are ready to go.

1—OWS 9 x 9 x 9 Drawworks unit with hydromatic brake, double engine drive water cooled drum. Complete with guards and chains.

1—400-ton 8" Ideco swivel complete w/goose neck and lefthand bottom connections.

Other drilling equipment, also 3½" and 4½" O.D. drill pipe for sale. F. H. Brown, P. O. Box 331, Carmi, Illinois.

● **FOR SALE: 3 complete Power Rotary Drilling Rigs with approximately 7000 feet 3½" OD Drill Pipe and 12,000 feet of 4½" OD Drill Pipe. All Waukesha, Butane Equipped Motors and Gardner Denver 14 Pumps. These rigs are all running and in good condition. Box 331, Carmi, Illinois.**

● **FOR SALE: 3975' of 5-9/16" regular API drill pipe. 1300' Hughes FH drill pipe. 1-3 speed Union Tool Drawworks. General Oil Tool Company, Burrton, Kansas.**

● **LUMBER FOR SALE: Douglas Fir oil field lumber and timbers up to 100 feet in length; also pine and hardwood timbers. E. J. Galennie, Box 1074, Shreveport, La.**

HELP WANTED

● **SUBSTANTIAL and progressive Independent Oil Company desires Geologist who has wide experience in mid-continent field. Salary not less than $750.00 per month to start. Good opportunity for advancement. No objection to Geologist making oil investments so long as it does not interfere with company's business. State experience, references. Post Office Box 1805, Fort Worth, Texas.**

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Trading Post Section, THE OIL WEEKLY
P. O. Box 2608 Houston, Texas

K.C. 3093 ft, Miss. 4232 ft, Viola 4330 ft, Simp. 4435 ft, Arb. 4444 ft, abnd 4457 ft.

Harvey County—Failure: H. H. Williams' Stuckey 1, nec 25-22s-3w, lcn abnd.

Pawnee County — Failure: Gulf's Schookey 1, c s½ se se 22-20s-20w, Viola 4538 ft, Simp. Ls. 4735, Simp. Sh. 4736 ft, Cong. 4266 ft, Arb. 4766 ft, abnd 4823 ft.

Rooks County—Failure: Shell's J. M. Howard 1, swc 26-10s-18w, abnd 3708 ft.

Russell County—Failure: Saco's Eulert 1, nec se 33-11s-15w, Arb. 3275 ft, abnd 3310 ft.

Stafford County—Failure: Gulf's Andreas 1, c e½ ne se 4-23s-12w, Viola 3705 ft, Simp. 3718 ft, Arb. 3776 ft, abnd 3898 ft.

Sumner County—Failure: Magnolia's C. E. Rowan 1, ne sw sw 3-30s-4w, Simp. Sd. 4406 ft, Arb. 4505 ft, abnd 4545 ft.

KENTUCKY

Butler County: Bennett Bros.' Wade Cook 1, 13-H-32, Jones 418-439 ft, 15 bbls, td 440 ft.

Daviess County: A. J. Slaghter et al's Dr. Griffith 1, 11-O-26, abnd 2336 ft.

H. H. Vickers' B. Crow 2, 2-O-33, abnd 442 ft.

Henderson County: Cherry & Kidd's Burbank 14, 3-P-21, Cypress 2295-2300 ft, 350 bbls, 2300 ft.

Gulf's Moorehead 7, 23-Q-21, Cypress 2308-18 ft, 100 bbls, 2318 ft.

Ind. Farm Bureau's Burbank 5, 24-Q-21, McCl 2620-24 ft, 28 bbls, 2724 ft.

McLean County: Sohio Prod. Co.'s Worthington 1, 10-N-27, abnd 2185 ft.

Ohio County: R. E. Masev's C. Martin 1, 3-M-31, 25 bbls, Tar Springs 716-28 ft and 741-54 ft, 25 bbls, td 754 ft.

Galey & Vickers' Wedding 16, 12-M-33, Tar Springs 308-19 ft, 10 bbls, 329 ft.

A. F. Lykins' Sam Davidson 1, 8-M-34, abnd 706 ft.

H. H. Vickers' B. Crow 3, 9-O-33, abnd 515 ft.

Union County: Ohio's Chancellor 2, 9-O-20, McCl 2535-36 ft, 2545-50 ft and 2575-81 ft, 200 bbls, td 2589 ft.

Texas' H. J. Greenwell 1, 9-O-20, abnd 2738 ft.

Weinert and Pure's Greenwell 3, 10-O-20, McCl 2570-78 ft, 371 bbls, 2588 ft.

Webster County: Iley Browning's Strum 2, 8-N-23, Benoist 2465-81 ft, 60 bbls, 2725 ft.

Mid-Continent's Miner 1, 15-N-24, abnd 2739 ft.

KENTUCKY WILDCATS

Clinton County—Failure: H. L. Browning's McIntosh 1, 20-H-25, abnd 1252 ft.

Henderson County—Failures: Kingwood Oil Co.'s Rash A 1, 16-Q-25, abnd 2568 ft.

A. J. Slaghter et al's Conley 1, 20-Q-25, abnd 2318 ft.

Todd County — Failure: Coleman & Son's Garrett 1, 20-G-28, abnd 375 ft.

Webster County—Discovery: B. B. Hamilton's A. B. Sellers 2, 14-N-24, Cypress 2233-42 ft, 15 bbls, 2725 ft.

SOUTH LOUISIANA

Beauregard Parish—Bear: General Crude's Powell 1, 2031 ft n, 1930 ft e of sw cor sec 22-6s-9w, abnd 6908 ft.

LaFourche Parish—Delta Farms: California Co.'s Delta Farms 12, start ne cor sec 1, go w 957 ft then s 1 deg 00 mins 2004 ft e to lcn in 1-17s-22e, 7-in 9060 ft, perf 9029-57 ft, 285 bbls, 9/64-in, td 9060 ft.

St. Charles Parish — Paradis: Texas Co.'s Sunset Realty 14, 2420 ft s, 4490 ft e of ne cor frac sec 8 in drilling unit 227 in sec 39-14s-20e, 7-in 10,400 ft, perf 10,329-352 ft, flow 245 bbls, 9/64-in, td 10,400 ft.

St. Charles Parish—Bayou des Allemands: Stanolind's St. Charles Land 4, 2998 ft w, 750 ft s of ne 13-15s-20e, 5½-in 10,063 ft, perf 9980-86 ft, 146 bbls, ¼-in, td 10,556 ft.

St. Mary Parish—North Jeanerette: Atlantic's Adeline Sugar 2, 1980 ft w, 660 ft s ne 18-13s-9e, abnd 12,041 ft.

SOUTH LOUISIANA WILDCAT

Beauregard Parish — Discovery: Sohio Oil Co.'s Lutcher-Moore 1, sw sw sw 34-6s-12w, 3 mi n DeQuincy, 5½-in 8123 ft, perf 8014-20 ft, flow 180 bbls condensate, ¼-in, tp 2550, csg sealed, td 10,911 ft.

NORTH LOUISIANA

Bienville Parish — Lucky: Placid Oil Co.'s Nebo A2, 5-15n-6w, 27,000,000 gas, perf 8100-10 ft, td 8302 ft.

NORTH LOUISIANA WILDCAT

Bienville Parish—Failure: J. S. McCullough's McConathy Unit 1, nw 19-16n-4w, abnd 7324 ft.

MICHIGAN

Arenac County—South Adams: Ervin Major's Maday 1, c se sw 36-19n-3e, Traverse lime, abnd 3010 ft.

Arenac County—Deep River: Arenac Oil & Gas Co.'s Herzberger 1, c sw 7-19n-4e, Berea sand, 700,000 gas, 1546 ft.

Clare County — Cranberry Lake: Taggart Bros.' S20, c nw 17-20n-5w, Stray sand, 11,950,000 gas, 1269 ft.

Osceola County—Rose Lake: Rowmor et al's Sanford 1, s½ se ne 31-19n-9w, Traverse 3143 ft, Dundee 3770 ft, abnd 3827 ft.

Ohio's Howe 1, s½ se sw 31-19n-9w, Traverse 3074-3165 ft, flow 256 bbls, td 3849 ft, pb 3156 ft.

Van Buren County—North Bangor: Michahoma Oil Co.'s Austin 3, nw se sw 9-2s-16w, Traverse lime, flow 33 bbls, 1015 ft.

MICHIGAN WILDCATS

Antrim County — Failure: Oil Producers, Inc.'s White 2, nw ne ne 17-31n-5w, Dundee 1619 ft, Monroe 1681 ft, abnd 1754 ft.

Osceola County — Failure: P. J. Bolger's Carlson 1, s½ sw se 26-19n-10w, Dundee 3700 ft, abnd 3715 ft.

Osceola County — East Evart — Discovery: Sun Oil Co.'s Davy 1, n½ ne sw 25-18n-8w, elev 999 ft, Dundee 3742 ft, pay 3744-46 ft, pump 43 bbls, td 3751 ft.

Wexford County — Failure: Hassie Hunt's Zayler 1, w½ se nw 30-22n-10w, Dundee 3704 ft, abnd 3856 ft.

NEW MEXICO

Eddy County: Neil H. Wills et al's Wills 3, c nw se 13-20s-28e, pump 40 bbls, shot 20 qts 817-37 ft, td 845 ft.

Lea County—Lynn: T. P. Coal & Oil Co.'s State 9-A, acct. 1, c sw sw 9-23s-36e, flow 336 bbls, 2-in, acid 1000 gals, perf 3678-92 ft, td 3729 ft.

Lea County — Mattix: Plains Prod. Co.'s Knight-Humble 1, c sw sw 14-24s-37e, Yates 3200 ft, flow 120 bbls, ½-in, shot 230 qts 3378-3458 ft, td 3511 ft.

NEW MEXICO WILDCAT

Eddy County—Failure: Johnston and Neil Will's Wills 1, 1980 ft wel and 3300 ft snl 17-20s-28e, abnd 990 ft.

OKLAHOMA

Bryan County—Cumberland: Pure's Myers 213 1, ne nw sw 34-5s-7e, Oil Creek 6054 ft, abnd 6062 ft.

Carter County—West Hewitt: Geo. Jones' McKee 2, ne sw sw 20-4s-2w, sand 2025-40 ft, pump 11 bbls oil, 8 water, 2834 ft.

Comanche County—Lawton: J. C. Palmer's Fee 19, nw ne nw 28-2n-10w, abnd 468 ft.

Comanche County—Fort Sill: R. E. Green's A 1, se sw ne 4-3n-10w, abnd 1308 ft.

Creek County—Glenn: Gulf's Clayton 34, se ne se 8-17n-12e, Glenn 1514 ft, Input, 1693 ft.

Garvin County — Pauls Valley: Phillips' Maudlin 1, nw se se 31-4n-1e, Penn. 4101-16 ft, flow 345 bbls, 4187 ft.

Garvin County: Pure's Jackson Consol 1, se nw se 31-4n-1e, Penn. 3940 ft, flow 66.24 bbls, 4175 ft.

Hughes County—Fish: Winona's Jenny 1-A, sw se ne 17-7n-8e, Wilcox 4278-84 ft, abnd 4284 ft.

Hughes County — W. Holdenville: A. L. Wickett et al's Witty 1, c nw se 21-7n-8e, Wapanucka 3260 ft, Cromwell 3287 ft, abnd 3287 ft.

Logan County — Lovell: Kay County Gas Co.'s Gragg 1, sw sw se 16-18n-4w, Hunton 3436 ft, 12,500,000 gas, 3454 ft.

Okfuskee County—NE Dill: Selby's Dawson 1, ne se sw 13-12n-8e, Cromwell 3574 ft, pump 22 bbls, 3587 ft.

Okmulgee County — Okmulgee: Wood Oil Co.'s McAdoo 3A, ne se ne 28-13n-13e, Manafield 1723 ft, pump 25 bbls, 1752 ft.

Osage County—Burbank: Phillips' 17, c nw sw 32-27n-6e, Burbank 2867 ft, abnd 2935 ft.

Pottawatomie County—S. Brooksville: Stanolind's Goloby 1, sw se se 9-8n-3e, Hunton 4881 ft, 7000 gal acid, swab ⅝ bbl, pb 4979 ft, td 5136 ft.

Pottawatomie County — Brooksville: Cities Service and Atlantic's Ft. Cobb Oil Co. 1, sw ne ne 4-8n-3e otd 5465 ft, Hunton 4768 ft, 500 gal acid, flow 1246 bbls, td 5465 ft.

Sequoyah County—Foreman: Western Okla. Gas Co.'s Bourdon Unit 1, nw ne sw 2-10n-24e, abnd 3972 ft.

Stephens County—Velma: Burkhart's Spears 2A, ne ne sw 15-1s-5w, sand 375-88 ft, pump 5 bbls, 389 ft.

Stephens County: Magnolia's London 1, c nw se ne 26-1s-5w, sand 1362-76 ft, pump 42 bbls, 1400 ft.

Stephens County—Velma: Skelly's Stiefel B 22, n½ sw nw nw 35-1s-5w, sand 932-35 ft, abnd 935 ft.

OKLAHOMA WELLS DEEPENED

Creek County—Olive: F. L. Marr's Wilson No. 23, ne ne se 34-18n-8e, otd 1600 ft, Redfork 2556 ft, shot with 10 qts, pump 20 bbls, 2556 ft.

Okfuskee County—Dill: Phillips Replogle 1, sw se nw 26-12n-8e, otd 3713 ft, Cromwell 3692-3708 ft, shot 40 qts, swab 36 bbls, 3713

OKLAHOMA WILDCATS

Caddo County—Failure: Denver P&R Co.'s Sah Cam 1, c se se 33-10n-10w, temp abnd 13,842 ft.

Comanche County—Failure: Northern Ordnance's Spencer 1-A, sw nw se 21-3n-10w, abnd 2420 ft.

Jackson County—Failures: Jorden Pet. Co.'s Sumrow 1, c se ne 17-1n-20w, abnd 3175 ft.

English's Mathews 1, nw sw nw 19-2n-18w, abnd 1195 ft.

Lincoln County—Oil Discovery: Mid-Continent's Fowler 1, sw sw ne 33-12n-4e, perf 5542-48 ft, pump 105 bbls, 5562 ft.

Lincoln County—Failures: Wilco's Delozier No. 16, sw sw sw 10-14n-6e, abnd 3343 ft.

R. H. Lynn's Adams 1, ne ne se 8-15n-4e, abnd 3871 ft.

Logan County—Failure: Paul McIntyre et al's Morris 1, c nw sw 13-19n-2w, abnd 5468 ft.

Pawnee County—Failure: Deck & Flynn's School 1, nw ne ne 16-21n-6e, abnd 3155 ft.

Payne County — Failure: W. H. Elson's Sohio's McCarty 1, ne ne sw 7-17n-2e, First Wilcox 4825 ft, abnd 4584 ft.

Pontotoc County—Failure: J. F. Root et al's Marshall 1, nw nw se 31-6n-4e, abnd.

Pottowatomie County—Failure: Fain Drilling Co.'s Pum-Y-Mum-Moke 1, nw sw ne 11-10n-3e, abnd 5749 ft.

EAST TEXAS

Wood County—Quitman: Bridewell-Lacy & Wise's Stone-Johnson 1-B, 2161 ft nsl, and 1398 ft ewl H. Anderson sur, A 9, elev 422 ft, Georgetown 5003 ft, Goodland 6134 ft, Paluxy 6202 ft, flow 803 bbls, ¼-in, perf 6208-6305 ft, td 6315 ft.

Chas. L. McMahon, Inc.'s Taylor 1, 2355 ft ewl and 2018 ft nsl H. Anderson sur, A 9, elev 432 ft, Georgetown 4980 ft, Goodland 6130 ft, Paluxy 6200 ft, flow 776 bbls, ¼-in, perf 6224-90 ft, td 6320 ft.

EAST TEXAS WILDCATS

Kaufman County—Failure: Sun's Rutledge 1, 2376 ft fr se, and 660 ft fr ne lines 200-ac tr, E. Parsons sur, elev 584 ft, Georgetown 4021 ft, Goodland 4815-81 ft, massive anhydrite 5967-6089 ft, Travis Peak 6481 ft, Cotton Valley 7577 ft, Buckner 9210 ft, salt 9833-9980 ft, Buckner-Smackover contact 10,042 ft, abnd in hot sul w 10,057 ft.

Rusk County—Oil Discovery: Beacon O&R Co. and American Liberty Oil Co.'s J. H. Allen 1, 2200 ft ewl and 2250 ft snl of Taylor Brown sur, 4¾ mi e of East Texas field discovery and 4 mi nw Henderson, elev 437 ft, Pettit saturation 7250 ft, flow 232 bbls 41.8-gr, gas-oil ratio 634/1, Pettit perf 140 shots 7250-64 ft, td 7495 ft.

TEXAS PANHANDLE

Gray County: Magnolia's Darsey-Magnolia 2, sw ne nw ACH&B 26, blk 1, elev 3000 ft, pump 171 bbls, shot 2860-2952 ft.

Hutchinson County: Pennowa O&G Co.'s Harvey Sisters 2, sw ne nw H&TC 71, blk Z, pump 51 bbls, shot 260 qts 2980-3030 ft, td 3037 ft.

Skelly's Crosby-Hatcher 4, 1712 ft fr m/n/n and 352 ft fr m/w/w lines TC Ry 3, blk M-24, pump 42 bbls oil, 111 water, acid 1000 gals 3274-91 ft, td 3295 ft.

TEXAS GULF COAST

Harris County—Dyersdale: Edwin Nielsen's Reichardt 2, 80-ac lse, Samuel Kelly sur, abnd 4075 ft.

Matagorda County—North Markham: Ohio Oil Co.'s Carlson 21, 510 ft fr nel & 140 ft fr sel I½GN 10, 5½-in 8115 ft, perf 7718-23 ft, flow 207 bbls, ⅛-in, td 8125 ft.

TEXAS GULF COAST WILDCATS

Brazoria County—Failure: Rowan Drilling Co.'s Mixson 1, 27-ac tr, HT&B 5, abnd 7861 ft.

Wharton County—Failure: J. F. Hutchins' Duncan 1, 3000-ac tr, Alexander Edgar sur, A 93, Egypt area, abnd 3410 ft.

LOWER TEXAS COAST

Bee County — South Caesar: Atlantic and Southwood's Grissom 2, 83-ac tr P. B. McEarly sur A236, 7-in 6690 ft, perf 6637-41 ft, flow 76 bbls, 7/64-in, td 6690 ft.

Atlantic and Transwestern's Grissom 1 C, 100-ac lse, P. B. McEarly sur, 5½-in 6645 ft, flow 81 bbls, 3/32-in, td 6645 ft.

Goliad County—Slick Wilcox: Continental's Wood 3, 151-ac lse, CEIP&M sur 2, 5½-in 7652 ft, perf 7640-45 ft, flow 249 bbls, 10/64-in, td 7652 ft.

Jim Wells County—North Magnolia City: Edwin M. Jones' Evetts 1, 1665 ft fr sl & 780 ft fr wl & 558 ft fr nl of s 160-ac of tr 3, McIntyire tr, Marcelino Lopez sur, 5½-in, 5346 ft, perf 5296-5309 ft, flow 580 bbls, ¼-in, td 5352 ft.

Karnes County—Hobson: Seaboard's Fertsch 3, 100-ac lse, Don Erasmo Seguin Gr A 10, 5½-in 4024 ft, perf 4019-23 ft, flow 149 bbls, 5/32-in, td 4029 ft.

Nueces County—Agua Dulce: Jay Simmons' Traybig 3, 990 ft fr wl & 660 ft fr sl se¼ sec 193, 5½-in 7129 ft, perf 7083-86 ft, flow 149 bbls, ⅛-in, td 7129 ft.

Windsor Oil Co.'s Pyle 2, 276-ac lse, Paul's subdvn Driscoll Rch, abnd 6940 ft.

LOWER TEXAS COAST WILDCATS

Fayette County — Discovery: Continental's Cockrill 1, 330 ft fr n&wl's 138-ac tr 2, out of 390-ac lse, J. T. Whiteside Lge, 5½-in 1254 ft, perf 1186-89 ft, flow 55 bbls 18-gr, ¼-in, tp 120, cp 300, td 1498 ft.

Jim Wells County — Failure: William F. Morgan's Vandenberge 1, 168-ac lse, F. M. Rider Rch, Marcelino Lopez Gr, A-281, abnd 5819 ft.

Kenedy County—Failure: Humble's McGill 2, 4000 ft s, 12,000 ft e fr nw cor Santa Rosa de Arriba Gr, abnd 8545 ft.

Refugio County—Failure: Southern Minerals'

Powers 1, 600 ft fr nel, 725 ft fr sel of blk 21, 2485-ac lse, Garza & Vidaurri sur, A 66, abnd 6532 ft.

SOUTHWEST TEXAS

Duval County — Sejita: Cox & Hamon's Dickey 2, 467 ft fr nl, 2330 ft fr wl blk 7, sec 27, Realitos subdvn, Pedro de Charco Redondo gr, 5½-in 5792 ft, flow 287 bbls, ¼-in, td 5795 ft.

Jim Hogg County—Colorado: Humble's King Ranch 73-B, 7186 ft fr wl & 660 ft fr sl Las Moretas gr, 5½-in 3061 ft, sand 3965 ft, flow 187 bbls, 3/16-in, td 3077 ft.

Starr County—Lockhart: Lockhart & Davenport's Caffarelli 2, 1650 ft fr wl, 330 ft fr sl share 19-C, J. A. de la Garza Falcon porcion 80, 1158-ac lse, 5½-in 3807 ft, perf 3590-3600 ft, flow 36 bbls, 3/16-in, td 3617 ft.

Lockhart & Davenport's Caffarelli 5, 1320 ft fr wl, 2090 ft fr sl share 19-C, J. A. de la Garza Falcon porcion 80, 1158-ac lse, 7-in 3919 ft, perf 3760 ft-70 ft, 5,000,000 gas, td 4016 ft.

Zapata County—Lopeno: Jay Simmons' Ramirez 1, 467 ft fr ne&sel sw½ blk 4, porcion 20, 5½-in 2549 ft, sand 2465 ft, perf 2465-85 ft, 4,000,000 gas, td 2553 ft.

SOUTHWEST TEXAS WILDCATS

Duval County—Failure: Henderson Coquat's North 1, 660 ft fr sl, 2640 ft fr el 106-ac lse, Santos Flores Gr, abnd 5350 ft.

McMullen County—Oil Discovery: Quintana's South Texas Syndicate 7-C, 2135 ft fr el, 726 ft fr sl BS&F 19, 5½-in 3933, flow 89 bbls, 28.2-gr 3/16-in, td 3941 ft.

Webb County — Failures: Dulup Oil Co.'s Garcia 1, 330 ft fr n&nel's 40-ac lse, blk 42, sur 592, Los Ojuelos Gr, abnd 1915 ft.

O. W. Killam's Long 1, 330 ft fr n&wl's 160-ac lse, LI&AA sur 1009, abnd 3185 ft.

Weinert & Bauchman's Leal 1, 330 ft fr sl, 371 ft fr el sur 667, 2 mi ne West Cole field, abnd 2690.

Zapata County—Failure: Texas Co.'s Hartman 5, 1650 ft fr swl, 3061 ft fr nwl Sam Hamilton sur 292, abnd 2336 ft.

SOUTH CENTRAL TEXAS WILDCATS

Gonzales County — Failure: Texon Royalty and Auto Ordnance's Kelly 1, 2780 ft w alg nl fr ne cor 330-ac tr, 1800 ft s at ra to lcn in tr 2, 3 mi sw Dilworth, abnd 6420 ft.

Guadalupe County—Failure: Lehigh J. Sessions' Mattke 2, 100-ac lse, Y. P. Alsbury sur, abnd 1423 ft.

Travis County—Failure: B. E. Pierce's Acklin 1, 279-ac lse, Manor area, abnd 707 ft.

Williamson County—Failure: Foster, Caffey & Stubbs' Carlson 1, 600 ft fr sl, 714 ft fr wl 100-ac lse, Asa Thomas sur, abnd 750 ft.

NORTH TEXAS

Archer County—Cooper: Champlin Ref. Co.'s Hefley 1, 535 ft nsl, 570 ft ewl blk 7, leag 3, Denton CSL, KMA 4121 ft, Bend 4600 ft, Barnett 4940 ft, pump 22 bbls, acid 4000 gals 4921-40 ft, td 4942 ft.

Archer County: Henry Grace Prod. Co.'s Carpenter 17, 1200 ft nsl and 300 ft wel lot 89, blk 4, Clark-Plumb sur, abnd 1821 ft.

Clay County: Bridwell Oil Co.'s Harrison-Allen 6, 6140 ft from se and 310 ft from sw lines J. Duncan sur, A 111, abnd 1205 ft.

Perkins & Cullum's Taylor 10-B, 200 ft fr se and 472 ft fr sw lines blk 42, Bacon sur, pump 35 bbls, sand 1055-75 ft.

Perkins-Cullum's Taylor 4-C, 150 ft fr nw and sw lines blk 43, Bacon sur, pump 90 bbls, sand 1046-53 ft, td 1065 ft.

W. H. Spradling et al's Taylor-Elliott 5, 1650 ft nsl and 14 ft wel blk 55, Bacon sur, abnd 1155 ft.

Clay County—Joy: Shell's Brock 4, 1600 ft snl and 985 ft wel sec 30, H. Williams sur, Bend 5375 ft, Miss. 5857 ft, flow 2118 bbls, 2-in acid 2000 gals 58-64-5938 ft.

Cooke County—Walnut Bend: Sinclair Prairie's Atkins 15, 155 ft nsl and 541 ft wel sec 69, Fannin CSL, flow 1253 bbls, 2-in, perf Winger sand 5449-5513 ft, td 5609 ft.

Texas Co.'s Robinson 2, 660 ft nsl and 1494 ft ewl lot 1, leag 76, University sur, A 1397, flow 378 bbls, 2-in, Winger sand perf 5562-72 and 5602-14 ft, td 5662 ft.

Jack County—Ellis: Hanlon-Buchanan's Ellis-Dubose 2-C, 1768 ft nsl and 5111 ft ewl lot 6, J. W. Williams sur, pump 25 bbls, acid 12,000 gals, Bend perf 4816-22, 4882-84 and 4896-4904 ft, td 5157 ft.

Hanlon-Buchanan's Ellis-Dubose 3-C, 510 ft n and 495 ft e of sec of Jones 101½-ac tr, but in J. W. Williams sur, Bend 4822 ft, abnd 4981 ft.

Jack County — Hoefle: Hanlon-Buchanan's Rounsaville 1, 495 ft out swc e 265½-ac tr, John S. Porter sur, Bend 4853 ft, flow 376 bbls, ¾-in, acid 3000 gals 4863-95 ft.

Jack County—Mathis: Phillips' Carney-Pan 2, 470 ft snl and 1850 ft wel C. M. Snodgrass sur, A 1314, pump 29 bbls, shot 20 qts 2911-16 ft, td 2926 ft.

Paul P. Steed et al's Carney 1, 467 ft out sec s-91 ac of J. P. Rogers sur, A 501, abnd 3083 ft.

Montague County — Illinois Bend: Continental's Vaughn 2, 1340 ft wel and 1394 ft nsl Tobias Coulter sur, A 128, abnd 4880 ft.

Throckmorton County: T. S. Stanfield et al's Morrison 1, 1200 ft nsl and 951 ft ewl TE&L 910, abnd 555 ft.

Wichita County — KMA-Ellenburger: E. C. Oil Co.'s Hodges 3-E, 2010 ft nsl and 1258 ft wel W. H. Spillers sur, Ellenburger 4225 ft, flow 1210 bbls, ¾-in, acid 4000 gals 4228-32 ft, td 4257 ft.

Wichita County — K-M-A: Hanlon-Buchanan's Wichita Water Co. 1, 718 ft ewl and 2272 ft snl blk 29, HT&B sur, A 128, lime 3938 ft, pump 14 bbls, shot 160 qts 4108-40 ft, td 4143 ft.

F. W. Merrick's Lockridge 1, 810 ft s and 330 ft w of m/s/ne cor L. Netherly sur, A 240, lime 3995 ft, pump 8 bbls, shot 210 qts 4016-80 ft.

Wichita County: Akin-Dimock et al's Cooper 1, 2200 ft nsl and 1900 ft wel H. Hastie sur, A 92, abnd 1331 ft.

Akin-Dimock et al's Dunn 1, 3600 ft nsl and 7300 ft wel of W. H. Anderson sur, A 1, abnd 1332 ft.

C. B. Christie et al's Munger 1, 330 ft out sec lot 9, blk 24, KWVFL, abnd 1804 ft.

Cochran & Cain's Waggoner Est. 3-A, 830 ft nsl and 1330 ft ewl HT&B 14, A 505, pump 9 bbls, perf 1754-67 ft, td 2000 ft.

Young County: Panhandle Ref. Co. - Ben Rankin's King-Wooten 4, 467 ft nsl and 420 ft wel TE&L 1977, flow 96 bbls, 1-in, sand 2778-88 ft.

Wichita Prod. Co.'s Hamilton 9-A, 1317 ft snl and 1067 ft wel s½ TE&L 1810, abnd 1042 ft.

NORTH TEXAS WELLS DEEPENED

Clay County: Sussex Oil Corp.'s Glasgow 31, 1410 ft fr ne and 1100 ft fr se lines blk 34, Bacon sur, otd 1264 ft, abnd 1880 ft.

NORTH TEXAS WILDCATS

Archer County—Failures: G. E. Kadane & Sons' Ferguson-Conoco 1, se se se SP 1, A 417, KMA lime 4049 ft, Bend 4495 ft, Ellenburger 5015 ft, abnd 5119 ft.

G. E. Kadane & Sons' Parkey 2, 2020 ft wel, 2300 ft nsl SP 1, A 419, abnd 1750 ft.

Clay County—Failure: W. H. Spradling et al's Ferguson 1, 550 ft nsl, and 950 ft ewl blk 34, Byers sur, abnd 1165 ft.

Montague County—Failure: C. E. Rodgers et al's Neeld-Stanolind 1, 656 ft fr se, 400 ft fr sw lines blk 90, Panola CSL, Palo Pinto 1752 ft, Bend 5876 ft, Marble Falls 6084 ft, Simpson 6818 ft, Ellenburger 7164 ft, abnd 7222 ft.

Throckmorton County—Oil Discovery: Anderson - Prichard Oil Corp.-Bruce Sullivan's Batchelor 1-a, 680 ft nsl and 660 ft wel TE&L 1691, Palo Pinto 2120 ft. Bend 3917 ft, black lime 3985 ft, pump 72 bbls oil, 48 water, acid 500 gals Bend pay 3926-29 ft, td 4311 ft.

Young County—Oil Discovery: C. A. Lupton and Jerome McLester's Johnson 1, 660 ft out nwc sec 3, BRR or F. M. Diew sur, A 1417, Marble Falls 3993 ft, flow 1128 bbls 41-gr, ¼-in, sand 3993-4007 ft.

NORTH TEXAS WILDCATS DEEPENED

Clay County—Failures: Continental's Hillburn 1, 779 ft wel and 1240 ft snl of 125-ac tr, E. W. East sur, A 133, otd 6470 ft, Smithwick 5170 ft, Miss. 6190 ft, Ellenburger 6200 ft, abnd 6515 ft.

Tom B. Owens' Blakely 1, 660 ft out nwc sec 79, Freestone CSL, otd 6950 ft, Marble Falls 6090 ft, Simpson 6828 ft, Ellenburger 6844 ft, abnd 7160 ft.

WEST TEXAS

Andrews County—Mascho: Belfort Oil Co.'s University-Tidal 1-C, c sw se sec 11, blk 10, pump 152 bbls, shot 720 qts 4460-4584 ft.

Phillips' University 3-A, 1920 ft snl and 678 ft ewl sec 3, blk 10, flow 203 bbls, ½-in, acid 4500 gals 4281-4604 ft.

Cochran County — Slaughter: Devonian et al's Duggan 6-C, 510 ft out sec lab 6, leag 54, Oldham CSL, flow 1067 bbls, 2½-in, acid 12,00 gals 5040-84 ft.

Ector County—North Cowden: Texas Co.'s Holt 27, 1981 ft snl and 2025 ft wel T&P 10, blk 43, T-1-N, flow 668 bbls, 2-in, shot 380 qts 4505-4705 ft.

Hockley County—Slaughter: Eugene Constantin, Jr. et al's Elliott 1-B, 440 ft out swc lab 6, leag 42, Rains CSL, flow 240 bbls, 36/64 in, acid 16,000 gals 4874-4932 ft.

L. M. Glasco et al's Mallet 11-C, 580 ft out swc lab 14, leag 48, Edwards CSL, flow 591 bbls, 2-in, acid 12,000 gals 4918-5013 ft.

Humble's Coons 10, 3810 ft snl and 660 ft wel PSL 11, blk X, flow 1451 bbls, cas, acid 10,000 gals, perf 4986-5040 ft, td 5067 ft.

T. F. Morrow et al's Mallet 41, 580 ft out swc lab 9, leag 48, Edwards CSL, flow 265 bbls, 1-in, acid 10,000 gals 4907-55 ft.

T. F. Morrow et al's Mallet 47, 580 ft out nec lab 8, leag 48, Edwards CSL, flow 512 bbls, cas, acid 12,000 gals 4905-50 ft.

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Texas Co.'s Slaughter 144, 580 ft out nwe lab 70, leag 38, Zavalla CSL, flow 1794 bbls, cas, acid 11,000 gals 4930-5016 ft.

Winkler County—Emperor: Skelly's Halley 61, ne ne se PSL 13, blk B-12, flow 795 bbls, ¾-in, shot 317 qts 2690-2870 ft.

Winkler County—Keystone: Skelly's Campbell 3-A, 554 ft snl and 1874 ft ewl PSL 29, blk B-3, abnd 3534 ft.

WEST TEXAS WELLS DEEPENED

Crane County — McElroy: R. A. Barger's (was Humble) University 2-C, ne ne se sec 40, blk 30, otd 2935 ft, pump 162 bbls, shot 360 qts 2872-3025 ft.

Scurry County—Sharon: D&R Oil Co.'s Van Norman-Shell 1, e nw nw H&TC 131, blk 97, otd 2459 ft, pump 18 bbls, td 3152 ft.

Upton County — McCamey: Shell's Bowen 11, se ne se GC&SF 6, otd 2112 ft, pump 200 bbls oil, 8 water, acid 1000 gals 2035-2160 ft.

Ward County: Tide Water's Johnson 9, H&TC 28, blk 34, otd 2676 ft, abnd 3015 ft.

Winkler County—Keystone—New Oil Pay: Sid Richardson and Perry Bass, Inc.'s Walton 4, 440 ft out swc PSL 5, blk B-2, otd 3376 ft, elev 2958 ft, San Angelo (Holt) 4600 ft, Clear Fork 4792 ft, flow 251 bbls 39.4-gr. gas-oil ratio 908/1, 23/64-in, acid 500 gals, San Angelo perf 4705-20 ft, td 4900 ft, pb to 4800 ft.

WEST TEXAS WILDCAT

Garza County—Failure: E. M. Wahlenmaier et al's Price 1, c se se TT 1116, blk D-15, elev 2552 ft, anyhydrite 765 ft, lime 2230 ft, abnd 3924 ft.

WEST CENTRAL TEXAS

Coleman County—Novice: States Oil Corp.'s Hudson 2, 1457 ft snl and 467 ft ewl sw¼ T&NO 22, blk 2, elev 1910 ft, Gardner sand 3332 ft, Gray 3485 ft, Bend 3650 ft, Ellenburger 4115 ft, abnd 4170 ft.

Jones County—Stith: Jones-Stasney-Groover & Rose's Cannon 4, 330 ft snl and 357 ft wel blk 81, leag 126, DeWitt CSL, abnd 2701 ft.

Jones County — Wimberly: Clark-Cowden Drilling Corp.'s Wimberly 4, 974 ft wel and 420 ft nsl blk 106, DeWitt CSL, leag 126, flow 802 bbls, ¾-in, acid 2500 gals 2212-25 ft.

Stephens County—Loving: Wittmer-Knight & Ewing's Compton 1-B, c se se sec 8, Orphan Asylum Lands, flow 106 bbls, 12/64-in, lime 3517-24 ft.

Stephens County—Hill: T. P. Coal & Oil Co.'s Hill 21-A, 330 ft se and 330 ft ne of m/w cor J. C. Talley sur, A 2058, elev 1157 ft, Bend 3252 ft, Marble Falls 3810 ft, Miss. 4425 ft, Ellenburger 4574 ft, abnd 4824 ft.

WEST CENTRAL TEXAS WILDCATS

Shackelford County — Failure: Roeser-Pendelton, Inc.-Continental's Cook 2-A-140, 342 ft snl and 1320 ft wel s½ ET 140, abnd 1779 ft.

United States Wildcat Starts

CALIFORNIA

Fresno County: Seaboard-Pure Oil Co.'s Corehole 2, se ne ne 32-17-14, Cantua Creek area, sp.

Kern County: Atlas Prod. Co.'s Anderson 1, se sw se 8-29-21, Belridge South area, lcn.

Los Angeles County: Richfield Oil Corp.'s T.L.T. 1, sw sw sw 19-3-15, Sylmar area, lcn.

Ventura County: Exeter Oil Co.'s Lenox 2, 6-1-21, Oxnard area, lcn.

ILLINOIS

Coles County: A. M. Myers' C. M. Flenner 1, sw ne sw 24-12n-10s, dr.

Jefferson County: Bell Bros.' Indiana Nat'l Bank 1, e2 ne ne 24-1s-3e lcn.

Jefferson County: Nash Redwine's H. M. Casey 1, se sw ne 6-3s-3e, lcn.

St. Clair County: G. A. Morris' Munier 1, se se nw 27-1s-8w, dr.

White County: W. G. Fortner's E. T. Questell, 1, ne sw nw 23-5s-9e, lcn.

White County: Continental's G. P. Hanna B 1, se nw nw 29-5s-10e, dr.

INDIANA

Daviess County: Southwestern Dev. Co.'s R. B. Lucas 1, se ne ne 25-2n-6w, lcn.

Tippecanoe County: Arthur Wolf's Fee 1, ne nw nw 10-24n-3w, lcn.

KANSAS

Barton County: Isern Bros.' Steckel 1, swc ne 8-20s-12w, lcn.

Brown County: Gall & Towle's Dillaplain 1, c sw ne 5-4s-15e, dr.

Dickinson County: N. Appleman and Nat'l's Shookey 1, nec se 18-14s-1e, lcn.

Ellis County: Carl Lebsack and H. E. Alexander's Dumner 1, c w½ nw nw 33-12s-18w, lcn.

Gove County: Globe Oil & Refg. Co.'s Snyder 1, sec 8-14s-29w, rur.

Graham County: Hollow's Benoit 1, sw se sw 15-8s-21w, rur.

McPherson County: Barbara Oil Co.'s Wedel 1, c s/2 ne nw 8-19s-1w, mim.

Pratt County: Lion Oil & Refg Co.'s Sadie 1, ne sw ne 2-26s-12w, mim.

Reno County: Phillips' Gassege 1, c ne ne 17-22s-7w, lcn.

Rice County: Adair & Morton's Teichgraeber 1, nec sw 4-18s-6w, dk.

Russell County: Ingling & Parker's Marshall 1, c ne nw 20-13s-11w, mim.

Saline County: E. T. Lindsay and R. S. Duffield's Robson 1, se ne ne 12-15s-1w, mim.

Stafford County: Marlyn Oil Co.'s Sittner 1, swc nw 4-22s-12w, dr, 3182 ft.

Stafford County: C. E. Blankenship's Clark 1, nw ne sw 4-22s-13e, sd 70 ft.

KENTUCKY

Daviess County: Carl Robinson's Johnson 1, 5-O-31, lcn.

Henderson County: Ashland Refg. Co.'s Sheffer 1, 10-O-23, lcn.

Henderson County: Carter Oil Co.'s W. W. Agnew 1, 7-O-24, dr.

NORTH LOUISIANA

Tensas Parish: Placid Oil Co.'s Ayer 1, ne 18-14n-11e, lcn, 8500-ft test.

De Soto Parish: Texas Mineral-Land Co.'s Scott 1, sw nw 33-14n-13w, lcn 2700-ft test.

MICHIGAN

Clare County: Turner Pet. Corp.'s Hildenbrandt 1, n½ nw ne 34-18n-3w, rig.

Kent County: James J. McGerry's Whittal 1, se se nw 26-9n-10w, rig.

Lake County: C. W. Teater's Heyd 1, n½ ne ne 35-20n-11w, dr.

Ottawa County: Southwest Dev. Co.'s Elfers 1, se se se 4-5n-15w, dr.

NEW MEXICO

Lea County: Carper Drilling Co.'s Nellis 1, c ne nw 5-18s-33e, lcn 4700-ft test.

John B. Hawley Jr.-Northern Ordnance's S. J. Iverson 1, c nw nw 30-18s-33e, lcn 5000-ft test.

OKLAHOMA

Comanche County: Northern Ordnance's Stephens 1, se nw ne 29-3n-10w, dr 1100 ft.

Garfield County: Peters & O'Neal's King 1, ne se sw 12-21n-3w, sd 2308 ft.

Lincoln County: Danciger's Katteredge 1, se se ne 7-12n-5e, dk.

Mid-Continent et al's McKeown 1, ne ne sw 9-16n-5e, lcn.

Logan County: Gulf's Prichard 1, nw nw 22-17n-3w, dr 2672 ft.

Noble County: Phillips' Tillman 1, se se sw 7-22n-2e, dr 1880 ft.

Star Mfg. Co.'s Evans 1, se sw sw 5-23n-2e, c & p.

Okfuskee County: T. N. Law's Palmer 1, 23-10n-9e, dr 2962 ft.

Pawnee County: Wolf Creek Oil Co.'s Norris 1, se se sw 28-22n-5e, dr 2475 ft.

Pittsburg County: Public Service's Berryman 1, sw ne se 2-6n-15e, dr 120 ft.

LOWER TEXAS COAST

Bee County: Rodney DeLange's Union Central 1, 2320 ft fr n&nwl SK&K sur 1, 509-ac lse, 4½ mi sw Skidmore, lcn.

Brooks County: Humble's Scott & Hopper 1, 660 ft fr el, 1980 ft fr sl SCH&B sur 107, lcn 8000-ft test.

DeWitt County: H. B. Zachry's Rath 1, Thomaston area, 467 ft fr se&swl 48-ac tr, Green DeWitt Lge, lcn 10,000-ft Wilcox test.

Jackson County: George W. Strake's DeVille 1, 660 ft fr el, 950 ft fr nl 160-ac tr, sec 11, Sutherland Pasture subdvn, George Menefee sur, lcn.

Refugio County: Pat R. Rutherford's Weiss-Zengerle 1, 330 ft fr s&el ne¼ sec 40, Johnson & Pugh subdvn Bonnie View Rch, Estaban Lopez sur, lcn 6500-ft test.

SOUTHWEST TEXAS

Wilson County: H. A. Rice's Skull 1, 110-ac tr, Manuel Ximinez sur, lcn 2800-ft test.

TEXAS GULF COAST

Fort Bend County: Humble's Stancliff 1, 358-ac tr, E. Alcorn sur, 4 mi se Sugarland, lcn 9500-ft test.

Harris County: Sun's Hirsch 1, Huffman area, 200-ac lse, James H. Isbell Lge, lcn 8500-ft test.

NORTH TEXAS

Archer County: Hedrick Oil Co.'s Carter 1, 1320 ft nsl, 990 ft ewl sec 21, blk 5, Clark-Plumb sur, lcn 1200-ft test.

George W. Cooper et al's Parkey 1, ne se se SP 1, A 419, lcn 5000-ft test.

Rathke Oil Co.'s Moss 1, 300 ft snl, 2000 ft wel TE&L 2479, lcn 1700-ft test.

Fannin County: W. I. Wynn et al's Lowery

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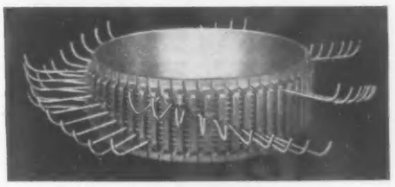

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The advantages of dual completions, including the large savings of steel, increased production, etc., indicate an increase in this type of completion during the present emergency.

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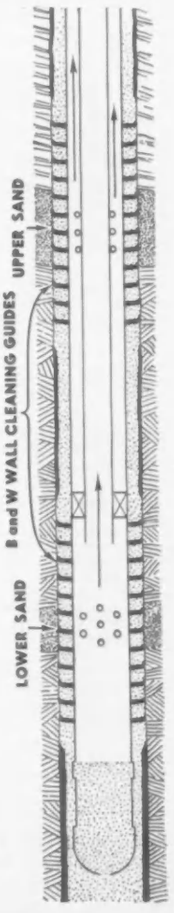

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1, 195 ft snl and 300 ft ewl 16-2/3-ac lse, Hammon Smith sur, lcn.

Young County: R. J. Watson et al's Jones 1, 200 ft snl, 960 ft ewl of e-120 ac of n½ TE&L 251, lcn, 700-ft test.

WEST TEXAS

Andrews County: Shell Cox 1, 1985 ft. nsl and 1965 ft wel PSL 5, blk A-31, lcn 7500-ft test.

Ector County: Forest Development Corp's Edward 1-D, c nw nw T&P 33, blk 43, T-3-S, lcn 4500-ft test.

Gaines County: Tide Water Associated Oil Co. et al's Woodley 1, c se PSL, 62, blk AX, lcn 7500-ft test.

WEST CENTRAL TEXAS

Shackelford County: C. A. Montgomery et al's G. W. Norton 1, 1600 ft from nw and 480 ft fr sw lines TE&L 567, lcn 600-ft test.

R. H. Roark et al's W. H. Green 2, 330 ft snl and 1980 ft ewl s½ T&P 49, blk 12, lcn 1500-ft test.

Roeser-Pendleton-Continental's Cook 2-A-141, 1707 ft snl and 2310 ft wel ET 141, lcn 1800-ft test.

Squeaks from the Bull Wheel

War-Time Living

"A little bundle from Heaven came to our house yesterday."

"So, boy or girl?"

"Neither, my laundry came back!"

Fame

On a train a church dignitary was approached by a slightly inebriated young chap who invited him to join a card game. The bishop quite naturally refused. And something in his manner may have been a tip-off, for his chance acquaintance asked:

"Shay, are you a preacher?"

"I am a Southern Methodist bishop."

"Southern Methodist? Gosh! Always thought that wash a football team!"

Golden Opportunity

The boss discovered he had left his pocket knife at home. He tried to borrow one from his staff, but each man said he either did not have a knife or had failed to bring it to the office with him. It was finally Jimmy, the office boy, who supplied the missing article.

Admiringly the boss exclaimed, "How is it, Jimmy, that you alone out of the entire staff seem to have a pocket knife on you?"

"Dunno, Sir," was the matter-of-fact reply, "unless it's because my wages are so low I can't afford more'n one pair of pants."

He got a raise.

Safe Deduction

I can't make them out. They have no car, no piano, no radio, and she hasn't any jewelry, no furs.

They probably have some money.

The Bird

Private Jones was already as overloaded as a pack-burro, what with rifle, extra rounds of ammunition, trenching tools, pair of cutters, tin hat, gas-mask, extra rations, and all the other equipment which makes the American soldier the best equipped if not the least burdened soldier in the world. The final straw came when he was handed a wicker cage containing a carrier pigeon.

The squads climbed over the top and advanced into the mist-hidden beyond. This was to be a surprise attack, so there had been no artillery preparation. At the observation post the Colonel and his staff waited for the sound of firing. Presently came the distant rattle of rifle fire, and the officers began to calculate how soon they might reasonably expect some word touching on the results of the foray.

They tried the ground telephone, but it was mute. They peered out into the mist for some sign of a runner. Suddenly the pigeon which had been entrusted to Private Jones soared into view, circled the portable cote and finally fluttered down and entered.

The colonel waited anxiously while a soldier climbed up and brought the feathered messenger down. With trembling fingers he sought out the tiny cylinder on the bird's leg, opened it and drew forth the message.

Unrolling the paper, he read this succinct statement: "I'm tired of carrying this damn bird."

Only the Beginning

A Negro preacher, desiring to impress upon his congregation the length of eternity, presented the following illustration:

"If a sparrow, breddern, should take a drop of water from the Atlantic Ocean at Coney Island, and with this drop of water in his beak should hop, hop, and hop across the country until it reached the Pacific Ocean at San Francisco, and when it got there should let the drop fall into the Pacific, and when this had been done should turn around and hop, hop, and hop all the way back to Coney Island and get another drop and do the same thing over, and keep on doing this very same thing until it had carried the whole Atlantic Ocean over into the Pacific, it would then only be the early morning in eternity."

Be sure to check the . . .

TRADING POST SECTION

on page 64 of this issue

"USED EQUIPMENT FOR SALE"

"EQUIPMENT WANTED TO BUY"

"HELP WANTED"

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Motor Transport Officials Hold Session at Lufkin

Directors of the Texas Motor Transportation Association met recently at Lufkin, home of the association's president, A. E. Cudlipp, who is vice president of Lufkin Foundry & Machine Company. The visiting directors were guests of the company at a supper at Pine Island Club and at luncheon following the meeting at the Angelina Hotel in Lufkin.

Directors attending were Roy Wilson, Roy Wilson Transfer & Warehouse Company, Longview; A. E. Cudlipp; John Massenberg, Office of Defense Transportation, Dallas; R. F. Sanford, Red Arrow Freight Lines, Houston; Ed Sproles, Sproles Motor Freight Lines, Fort Worth; J. A. Fadell, Merchants Fast Motor Freight Lines, Fort Worth; T. H. Callan, Central Freight Lines, Dallas; C. E. Bradley, Dallas Transfer & Terminal Warehouse Company; W. O. Compton, T. E. Mercer Team & Truck, Fort Worth; Harry Brown, Brown Express, San Antonio; R. L. Surles, Surles Truck Line, Houston; Ed Trout, Lufkin Foundry & Machine Company; Lynn B. Shaw, Texas Motor Transportation Association, Austin; and G. G. Langston, Lufkin Foundry & Machine Company.

Electronics Booklet

Westinghouse Electric and Manufacturing Company, East Pittsburgh, Pennsylvania, has published a new booklet, B-3264, called "Electronics at Work," illustrating electronic application in industry, in the war, in medicine, and on the home front.

A few typical applications shown in this booklet are: resistance welding control for sewing plane parts together at 1800 stitches per minute; cathode ray oscillograph for electrical circuit and lighting phenomena analysis at speeds of 1/100 of a millionth of a second; high-frequency induction heating units for plastic molding; tin reflowing and surface hardening; ignitron rectifiers for converting alternating to direct current in aluminum and magnesium production; industrial X-ray units for "inside" inspection of vital metal parts; precipitron for removing air-borne dust particles as small as 1/250,000 of an inch.

Officials of Texas Motor Transportation Association, guests of Lufkin Foundry & Machine Company. Center, Roy Wilson; first row, A. E. Cudlipp, John Massenberg, R. F. Sanford, Ed Sproles; second row, J. A. Fadell, T. H Callan, C. E. Bradley; third row, W. O. Compton, Harry Brown, R. L. Surles; fourth row, Ed Trout, Lynn B. Shaw, G. G. Langston.

PRACTICAL PETROLEUM ENGINEERS' HANDBOOK

SECOND EDITION—REVISED AND ENLARGED

By JOSEPH ZABA, E.M.M.Sc. and W. T. DOHERTY

This book was written by practical oil men. The tables were compiled so that they can be used by anyone to meet practical field situations without further calculations, and will fit 99% of the conditions under which the average operator is working in the field.

The second edition of the PRACTICAL PETROLEUM ENGINEERS' HANDBOOK has been completely revised and enlarged. The many changes which have been made during the past two years in the Standard Specifications of the American Petroleum Institute, particularly in pipe specifications, are incorporated in the new edition. Several tables are rearranged and charts enlarged to facilitate their use. Table of Contents and Index are more complete. Also about 90 pages of new formulae, tables, charts and useful information have been added.

This handbook was compiled and published for the purpose of saving the time of operators, engineers, superintendents, foremen and others.

TABLE OF CONTENTS

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By PHILIP B. KING

Geologist, Geological Survey, United States Department of the Interior, Washington, D. C.

PUBLISHED BY PERMISSION OF THE DIRECTOR OF THE GEOLOGICAL SURVEY AND OF THE SECRETARY OF THE GEOLOGICAL SOCIETY OF AMERICA.

REPRINTED FROM THE BULLETIN OF THE AMERICAN ASSOCIATION OF PETROLEUM GEOLOGISTS, VOLUME 26, NUMBER 4 (APRIL, 1942)

FOREWORD BY RONALD K. DeFORD AND E. RUSSELL LLOYD

CONTENTS

Chapter One—Introduction
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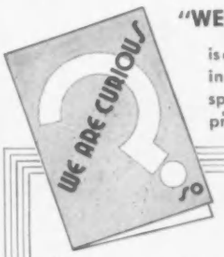

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Notes for the Equipment Buyer and User

Squirrel-Cage Induction Motor

FAIRBANKS, MORSE AND COMPANY

Fairbanks, Morse and Company, 600 South Michigan Avenue, Chicago, announces a new protected polyphase squirrel-cage motor, designed for general use.

"Protectioneered" is the word used to describe the motor by its manufacturers. It is constructed with centrifugally-cast copperspun rotor, and is protected against flying chips, falling particles, dripping liquids, and other industrial motor hazards. Ball bearings are sealed in cartridge-type housings. Cross-flow ventilation is obtained through protected inlets and exhausts at each end of the motor, resulting in uniform cooling and elimination of hot spots.

Because there are no external moving parts, safety for the operator of the motor is assured regardless of the position of the motor. The frame is cast in one piece with rib sections to give added strength without increase in weight.

Where space is limited, the conduit can be brought up between the motor feet to the tapped hole in the motor frame and the conduit-box cover assembled flush with the frame. The external box is then discarded. When the conventional conduit box is used, it can be mounted in any one of four positions.

The motor is rated at 40° C and is designed to carry 115 percent load continuously.

Precision Thread Grinder

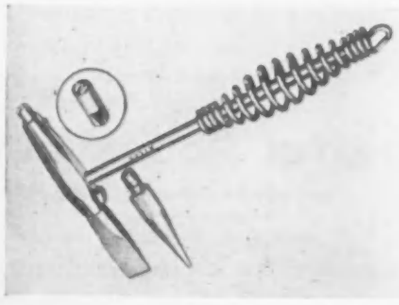
Landis Machine Company, Waynesboro, Pennsylvania, has issued bulletin E-93 on the Landis No. 6 Precision Thread Grinder, a modern development in a high-speed, precise machine tool for the grinding of threads of extreme accuracy.

Combination Weld Marking Tool

ATLAS WELDING ACCESSORIES COMPANY

Atlas Welding Accessories Company, 307 Boulevard Building, Detroit 2, Michigan, has announced a combination weld-marking tool and hammer.

This tool features a keyed symbol in the form of alphabetical and numerical combinations or distinctive outline symbols which are available in combinations to place permanent and definite responsibility for every weld and to identify individual welders in crews up to 15,000. This large number of combinations makes it possible to include inspectors' marks in the identification system.



Atlas Weld-Marking Tool

Marking tips are interchangeable; likewise, bits are replaceable at chipping end. Symbol and bit shanks are positioned and held in a snug socket-fit by set screws to prevent loosening. Weight of the hammer is 16 ounces; length is 10½ inches.

Fairbanks, Morse Motor

Rheostat Potentiometer

OHMITE MANUFACTURING COMPANY

Ohmite Manufacturing Company, 4835 Flournoy Street, Chicago, has developed a circular slide wire Rheostat, made to order to suit the particular application desired.

Designed especially for low-resistance low-wattage applications, this rheostat-potentiometer has found several applications in the instrument field. A length of resistance wire is stretched tightly around the outside of a cylindrical core which is bonded to a ceramic base. The wire is firmly anchored to two terminals. Contact to the wire is made by a phosphor-bronze spring arm which is connected to a third terminal. The provision of three terminals allows the unit to be used as a potentiometer or voltage divider. The maximum resistance which can be supplied on this unit is approximately 1 ohm while the minimum total resistance can be made approximately 0.1 ohm. Since the contact arm travels along the wire from end to end, the resistance variation is stepless. Shafts for knob control or for screw-driver control can be supplied.

Buying Data Booklets

Westinghouse Electric and Manufacturing Company, East Pittsburgh Pennsylvania, announces buying data in both bound and loose-leaf form for quicker selection, easier ordering and quicker delivery, for buyers of motor and control equipment.

Bound books contain prices, dimensions, application data and descriptions. The 180-page "Motor Buying Data" covers popular types and ratings of motors up to 100 horsepower, gearmotors, and motor-generator sets. "Control Buying Data" lists a wide variety of controls and accessories for direct-current, single-phase, squirrel cage and wound rotor motors.

U. S. Steel Products Company To Buy Petroleum Iron Works

United States Steel Products Company, a United States Steel subsidiary, has contracted to purchase the manufacturing assets of the Petroleum Iron Works Company, a subsidiary of American Republics Corporation. United States Steel Products Company, known as Boyle Manufacturing Company until September 23, is the Pacific Coast light weight steel fabricating subsidiary of United States Steel.

The Petroleum Iron Works Company has manufacturing plants at Sharon, Pennsylvania, and Port Arthur and Beaumont, Texas.

Kobe Discusses Post-War Plans at Sales Meeting

Kobe, Incorporated, Huntington Park, California, field executives, company engineers and management personnel recently attended a meeting of all Mid-Continent Division executives at division headquarters in Oklahoma City. The meeting was called for the purpose of reviewing technical and operating developments during the past year and laying groundwork for the company's postwar program. Those attending included: H. K. Browning, general sales manager; S. M. Huffman, plant manager; and R. F. McArthur, chief engineer, from the company's home office.

District managers present included: E. T. Harrison, Illinois; W. C. Gilmore, East Texas; G. F. Hurst, West Texas; C. E. Buchner, Gulf Coast; R. J. Lyons, North Texas; H. W. Wilson, Oklahoma; M. L. Walraven, Jr., Oklahoma; J. J. Prichard, Kansas.

Others in attendance at the meeting were: V. T. Kirkhuff, chief sales clerk, division sales office; W. L. Smith, stores manager; E. O. Layman, field engineer; C. E. Edwards, field representative; J. S. Williams, division office manager; R. A. Hammond, purchasing agent; R. A. Feemster, division sales manager; R. G. Ralph, division manager; H. K. Ihrig, manager, technical service department.

Kobe, Incorporated, district managers who recently attended a conference at Oklahoma City. Back row, left to right, E. T. Harrison, W. C. Gilmore, G. F. Hurst, C. E. Buchner; front row, R. J. Lyons, H. W. Wilson, M. L. Walraven and J. J. Prichard.

THE DU PONT "FAST-COUPLER" *Now* IN TWO POPULAR SIZES

On 2¼" cartridges weighing 5 pounds each.

On 2" cartridges weighing 2½ pounds each.

From the first day it was introduced, the Du Pont "Fast-Coupler" scored a hit. Oil prospectors found that this new way of joining dynamite cartridges together was a great time-saver.

Now, because it is made for both 2" and 2¼" cartridges, the "Coupler" will fill even more varied needs.

"Fast-Couplers" of both sizes are supplied on Du Pont 60% "Hi-Velocity" Gelatin Dynamite and "Seismogel."

Both couplers work the same—fast. They save time, hold the cartridges securely together and provide a stronger, more rigid charge that will remain intact under the most adverse conditions. They're a definite help to oil prospectors faced with a critical shortage of manpower.

Write for free book describing the "Fast-Coupler" and illustrating it in use. E. I. du Pont de Nemours & Co. (Inc.), Explosives Department, Wilmington, Delaware.

A case of Du Pont "Hi-Velocity" Gelatin complete with "Fast-Couplers."

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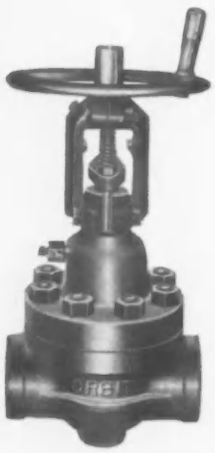

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SINCE 1912

TULSA, OKLAHOMA

Men in the Industry's News

DR. GORDON N. SCOTT has joined the executive staff of Industrial Engineering Company, Whittier, California, as consulting engineer in charge of research and development. He graduated from University of California in 1922, A.B. in chemistry, and B.S. cum laude in chemical engineering. In August, 1926, he won a Ph.D. in physical chemistry. Among his scholastic achievetments are memberships in Phi Lambda Upsilon, honorary chemical society, and Sigma Xi. Since 1928, he has been engaged in corosion research.

Following earlier activities in Hawaii and as research chemist for Mid-Continent Petroleum Corporation, he was appointed research associate at the National Bureau of Standards, in conjunction with the study of corrosion and mitigation and nationwide tests of protective coatings instituted by API. This work occupied him until December, 1934, after which he served the corrosion committee as pipe line technologist with headquarters in Dallas. Since 1936 he has continued his pursuit of solutions to the corrosion problem as a consultant at Los Angeles.

H. D. JENKINS, sales manager of the W. T. Waggoner Estate, oil division, since 1928, retired October 1. H. D. Moore, who has been cashier, will take his place.

LUTHER B. SMITH has been named acting chief geologist for Arkansas Gas & Fuel Oil Company, with headquarters at Shreveport. He is taking the place of S. A. Packard who is on indefinite leave of absence because of illness.

H. WINSTON HULL, chief clerk in the land and lease department of Skelly Oil Company at Tulsa, has been made manager of the West Texas-New Mexico area to succeed James Fitzgerald, resigned. Hull's position in the Tulsa office will be filled by T. Thompson, who prior to now has been title supervisor.

C. C. GIBSON, vice president and treasurer of the Paraffine Companies, Incorporated, San Francisco, was reelected vice president of the Controllers Institute of America at the annual business meeting recently in New York.

R. E. FOSS has been appointed general superintendent of operations in the California division of Barnsdall Oil Company. At the time of his new appointment he was chief engineer of the drilling department. His headquarters will be in Los Angeles.

R. W. GORDON, division manager of the Texas division of The National Supply Company, assumed the duties of manager of oil-field sales with headquarters at Toledo, Ohio, on October 1. Gordon has been affiliated with the company since 1917 and formerly served as division sales manager at Tulsa. James M. Thompson, Texas tubular manager at Fort Worth, succeeds Gordon as division manager of the Texas division. Thompson affiliated with The National Supply Company in 1940 following a tenure of six years of service with Norvell Wilder Supply Company as its representative in Texas and Oklahoma.

THOMAS I. PHILLIPS, vice president of Westinghouse Electric and Manufacturing Company, has been appointed head of the company's Pittsburgh divisions. He succeeds A. C. Streamer, who was named assistant to the president with headquarters in Pittsburgh.

DONALD L. NORLING, geologist for Shell Oil Company, has been transferred from Tulsa, to Centralia, Illinois.

J. H. HOWARD, vice president and general manager of the Globe Oil Tools Company, Los Nietos, California, died September 20 of a heart attack at his home in Whittier, California. He joined the Globe company as production manager in 1930 and has been vice president and general manager since 1934.

Advertiser's Index

***Indicates detailed information on products and services included in 1942 edition of Composite Catalog of Oil Field and Pipe-Line Equipment.**

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